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Gazetteer of India : Bihar

DHANBAD

Bihar District Gazetteers

DHANBAD

By

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सत्यमेव जयते

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P R E F A C E .

This is the first Gazetteer for Dhanbad district. Dhanbad was a part of Manbhum district which was first in Bengal and then came over to Bihar when Bihar was separated from Bengal. When H. Coupland, I.C.S., published the first *District Gazetteer for Manbhum* in 1911, Dhanbad was only a subdivision of Manbhum district in Bengal. The headquarters town was then known as Dhanbaid. Later when Manbhum was a district in Bihar, Dhanbad subdivision was raised to the status of a sub-district and the letter 'i' in the name of the headquarters station was dropped. As a result of the recommendation of the States Reorganisation Commission, the district of Dhanbad was carved out in 1956 and remained in Bihar while the other portion of Manbhum district went over to West Bengal.

Coupland's *District Gazetteer of Manbhum* was mainly based on the *Statistical Account of Bengal*, Vol. XVII by Sir W. W. Hunter and other materials gathered from local records and published treatises. The coalfields of Manbhum had already attained some importance and a separate chapter was given to the subject.

In the course of the last few decades, the district of Dhanbad has had phenomenal changes in all spheres. Bagsuma, the first headquarters of Dhanbad subdivision is a forgotten village now although Govindpur, the second headquarters of the subdivision has some importance because of its situation on the Grand Trunk Road. The headquarters of the subdivision had to be shifted to Dhanbad due to the growing importance of the coalfields. Dhanbad has become one of the most industrialised districts in India and is known all over the world because of the rich coalfields and the other natural resources. The story of the development of this district from when a Deputy Magistrate worked as the solitary Postmaster and *sowars* with swords escorted the bullock cart trains on the Grand Trunk Road is highly interesting. On the one hand, the coalfields, railways and roadways have developed enormously, industrialisation, trade and commerce have gone ahead rapidly, educational and technical institutions have multiplied and the principal towns have become cosmopolitan while, on the other hand, the Adivasis and the other indigenous elements of the population have undergone basic changes in their culture-complex which aspect offers a rich field for investigation.

Dhanbad district is now of great interest to the historian, sociologist, politician, industrialist, capitalist and the administrator. Coupland's Gazetteer has little value now although it was an excellent compilation.

The State Government of Bihar in the Revenue Department have undertaken the work of re-writing and publishing the entire series of the District Gazetteers of Bihar. The general pattern laid down by the Ministry of Scientific Research and Cultural Affairs (now merged in the Ministry of Education) has been generally followed. The Gazetteer for Dhanbad district is the twelfth in this new series. The re-written District Gazetteers of Hazaribagh, Muzaffarpur, Gaya, Singhbhum, Saran, Champaran, Monghyr, Palamau, Bhagalpur, Purnea and Darbhanga have already been published.

I was posted to Manbhum district 23 years back and had toured extensively throughout the district. In the course of collecting materials for the re-written *District Gazetteer of Manbhum* I had renewed my contacts in Manbhum district and some of my friends in Purulia had helped me considerably. Before the district was separated I had made it a point to study some of the old English correspondence volumes and other local records now in Purulia Record Room. My continuous contact with Dhanbad district for the last 23 years when the district rapidly changed has been very useful in the present assignment. It is needless to mention that a book of this type can only be possible by team work, the pooling of resources, extensive tours, study and collaboration.

The work has its own difficulties. While there is a plethora of recent reports of various institutions and departments, there have been no Survey and Settlement Operations nor any comprehensive socio-economic survey. The impact of the changes on the tribals and the other indigenous population had not been studied. Difficulties were also felt in obtaining reliable statistics from various sectors. Some of the corporate bodies and institutions could not even supply detailed information of their own departments. The District Gazetteers of the border districts of Bengal have not yet been published. At the same time I was fortunate in receiving ungrudging collaboration from the National Archives, New Delhi, National Library, Calcutta and the Asiatic Society of Bengal, Calcutta. These institutions had placed their old and rare books at my disposal and had gone out of their way to trace references to help my work. This was in great contrast to the type of collaboration that I got within the province where most of the officers in key

positions probably due to their own problems have very little leisure to give any active help. I am indebted to the successive Deputy Commissioners who have tried to help me in various ways, Shri K. K. Basu of the Bihar Judicial Service, Prof. N. L. Sharma, the Coal Board, the Indian Mining Federation and Shri S. N. Chatterjee, Superintendent of the Government Printing Press at Gulzarbagh. I have received great encouragement and guidance from Pandit Binodanand Jha when he was the Chief Minister and Shri K. B. Sahay who is the present Chief Minister. The work of re-writing of the District Gazetteers was sponsored by Shri K. B. Sahay in 1952 when he was the Revenue Minister and this was a few years before the Central Government took up the work. Shri M. P. Sinha and Shri B. C. Patel, the past and the present Revenue Ministers and Shri S. J. Mazumdar, I.C.S., Chief Secretary, have always taken a very keen interest in the work from the very beginning. The Central Gazetteer Unit gave me some useful suggestions which were used.

The outlook is to provide an objective book for a wide range of readers. It is realised that seldom any one takes up a comprehensive book of this type to read from the first page to the last and there has to be a certain amount of repetition in order to make each chapter useful. I have tried to present an up to date picture of the district knowing well that the district will undergo further rapid changes quickly. Today the urgency of the need of a book like this which is an investigation of the man and the district he lives in is unprecedented. I have enjoyed the work and it will be a great privilege if the book is of some help to the present and the coming generation.

PATNA :

The 28th December, 1963.

} P. C. ROY CHOUDHURY.

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CHAPTER I.

GENERAL.

GENERAL DESCRIPTION.

The district of Dhanbad was created under Government notification no. A. 9911, dated 24th October, 1956, and came into existence from 1st of November, 1956. The bulk of the area formed previously the Dhanbad sub-district with an Additional Deputy Commissioner as the administrative head. The areas of Chas and Chandankeary thanas from Purulia subdivision of the former Manbhum district in Bihar were transferred to Dhanbad when Purulia Sadar subdivision was transferred to the State of West Bengal in implementation of the recommendations of the States Reorganisation Commission. The status of Dhanbad sub-district was changed into that of a district and the post of the Additional Deputy Commissioner was converted to the post of a Deputy Commissioner.

The present district of Dhanbad has an area of 1,114 square miles. According to the 1961 census the total population of the district is 11,58,610 persons.

The principal town and administrative headquarters is Dhanbad situated almost in the centre of the district. The district consists of two subdivisions, namely, Dhanbad Sadar and Baghmara. The Sub-divisional Officer, Baghmara has his headquarters at Dhanbad temporarily as the site of the headquarters has not yet been finalised. This subdivision was created only after the transfer of the areas of Chas and Chandankeary. Dhanbad district continues to be within Chotanagpur Division.

ORIGIN OF THE NAME OF THE DISTRICT.

The district derives its name from Dhanbad the headquarters. There is no authentic record to show how Dhanbad took its name. One of the theories popular among the public is that this area was famous for the growth of "*Baid Dhan*" or *Baid* paddy. There are two kinds of paddy in the district. One is called '*Baid*' which ripens in *Kartik* (October-November). Another far-fetched theory is that the name of Dhanbad is derived from *Dhan*, a Kolarian tribe that lived in this area. "*Baid*" has perhaps been taken from the Urdu word "*Abad*" meaning occupied. Dhanbad may mean the place populated by "*Dhan*" a Kolarian tribe or occupied by "*Dhan*" (paddy) in general. The place may have been named in the same way as Jahanabad, Aurangabad, etc. There are several similar place-names in this district like Dhanibad, Chhatabad, Lovabad, Parbad, etc.

The district was first known as 'Dhanbaid'. It is believed that Mr. Luby, I.C.S., wrote officially and was permitted to drop the letter 'i' from 'baid'.

BOUNDARIES.

This district is bounded on the north and north-east by the Barakar river which separates it from Hazaribagh, Santhal Parganas and Burdwan districts, on the south there is no natural boundary. The limits of Chas and Chaudankeary thanas and a portion of the Damodar river now constitute the boundary. On the west it has Hazaribagh district. On the east the Barakar river forms the boundary.

THE HISTORY OF THE DISTRICT AS AN ADMINISTRATIVE UNIT AND CHANGES IN ITS COMPONENT PARTS.

The history of the district as an administrative unit and the changes in its component parts have been covered elsewhere.

For revenue purposes there are four revenue thanas in the Sadar subdivision, namely, Jharia, Gobindpur, Tundi and Nirsa and two in Baghmara subdivision, namely, Chas and Topchanchi.

For the purpose of police administration, the district has been subdivided into four circles: (i) Dhanbad, (ii) Gobindpur, (iii) Sindri and (iv) Katras.

Dhanbad circle has Dhanbad, Kenduadih and Joga police-stations, Gobindpur circle has Gobindpur, Tundi, Nirsa and Chirkunda police-stations, Sindri circle has Sindri, Jharia, Jorapokhari and Balliapur police-stations.

The above circles are under the jurisdiction of Dhanbad Sadar subdivision.

Katras circle which is in Baghmara subdivision has the following police-stations under it: (a) Baghmara, (b) Topchanchi, (c) Chas, (d) Chandankeary and (e) Katras.

NATURAL DIVISIONS.

Three distinct characteristics of the landscape are perceptible. They are: (i) the ranges of ridges sent out by the Parasnath in the remote northern and north-western region occupying an area of about 84 square miles, (ii) the coal-fields having approximately an area of 200 square miles in the southern and eastern parts and (iii) the series of uplands and intervening hollows with isolated bare ridges of varying elevation dotted here and there between them.

Broadly speaking Dhanbad district has two physical divisions, southern and northern. The southern portion is the colliery area with the industrial towns and the northern portion is the area of hills and scattered villages. The landscape of the southern portion

is undulating and monotonous with the smoke, the chimney and the stack of coal scattered here and there with intermittent scrubs of vegetation. The existence of underground working of collieries has affected the surface with many scars of subsidence. The roads are frightfully busy with heavy vehicular traffic. The railway tracks have fanned out widely and every big colliery is connected by the railways. The din and bustle of the day is, however, in contrast to the landscape in the night with innumerable electric lights all over and offer a panorama of pleasant sight.

Of picturesque scenery the more northern portion furnish but little in the dry months of the year except when the Parasnath or Tundi range gives a striking background to the picture. The general absence of big trees in this part of the country, and the fact that cultivation is almost entirely confined to the rice crop, gives the general appearance of a barren waste in the dry season. In the rains the landscape is more pleasant and the fresh green of the young paddy crop shades off into the darker green of grass which sprouts up with the first showers. This contrasts with the brown of the ripening crops on the high lands, and of the bare gravel ridges, varied here and there by black masses of exposed rock. These effects are naturally enhanced when the hills give a background of mingled jungle growth and enormous masses of rock of quaint shapes and varying shades of colour. In the early hot weather the jungle-covered areas, whether on the hills or in the plains, present for a time a brilliant landscape, the red blossom of the *palas* (*Butea frondosa*) contrasting in striking fashion with the fresh green of the new leaves. The district has varying landscapes in different months.

CONFIGURATION.

Before the transfer of the areas of Chas and Chandankeary from Purulia subdivision of the former Manbhum district the shape of the Dhanbad district resembled an irregular triangle having its vertex on the east and base on the west or resembled an irregular quadrilateral. Its maximum length from west to east was about 44 miles and maximum from north to south about 24 miles. The Grand Trunk Road divides the district into two almost equal northern and southern parts.

But with the addition of Chas and Chandankeary thanas from Purulia subdivision of Manbhum district (now in West Bengal), the present Dhanbad district has the shape of an irregular polygon. The maximum length from west to east now is about 46 miles and the maximum from north to south is about 47 miles.

HILLS.

Dhangi hills run from Pradhankhanta to Gobindpur in this district. They lie between the Grand Chord line of the Eastern Railway and the Grand Trunk Road. The highest peak in these hills is at Dhangi, P.-S. Gobindpur and is 1,265 feet high.

The Parasnath hills (4,480 feet) send out spurs, one of which passes through this district via Topchanchi and Tundi. This spur has no noteworthy conspicuous hills but contains two places, viz., Lalki (1,500 feet) and Dholkatta (1,250 feet) from where channels have been constructed for carrying water to Topchanchi reservoir. The Dhangri hills are dry for the most part of the year, but during the rains some grasses grow on them. The spur of the Parasnath hills running in Dhanbad district is forested and the non-forested area grows paddy in terraces. The details of the forest produce have been dealt with in the sub-section "Forest" of the chapter.

PLATEAUS AND PLAINS.

The district forms a part of the Chotanagpur plateau. But it is more of an up-land than a plateau. The up-land lies mainly in the northern portion of the district. Strictly speaking there are no large stretches of what may be called as plains in the district. However, the lie of the country in Chas and Chandankera may be taken as low up-lands where cultivation is practised.

RIVERS.

Following the natural slope of the district all the rivers which intersect or take their rise in it, have an easterly or south-easterly course. They have the usual characteristics of hill streams, their beds are entirely or almost dry during the greater part of the cold season, and in the hot season they are not navigable during any part of the year with the single exception of the Damodar river, and subject to sudden and violent floods which are usually of very short duration. Except where they run over exposed rock their beds are usually deep in gravel and sand; the banks are abrupt and broken into deep cuts wherever the drainage from the surrounding country finds its way to the level of the stream. Cases of alluvial deposits are very rare, and the only notable instance is the small island thrown up at junction of the Damodar and Barakar rivers. Diluvion on small scale is on the other hand constant, huge masses of gravelly soil are constantly being undermined and detached from the banks, and every heavy fall of rain scours out the small cuts and channels which feed the larger streams. There is no regular system of river-bank cultivation, and as a general rule the banks are covered with low scrub jungle.

THE BARAKAR RIVER.

The northern most river in Dhanbad is the Barakar, which skirts *Parganas* Tundi and Pandia and forms the northern, north eastern and eastern boundary of the district and runs for about 48 miles within this district. Running at first in a south-easterly direction, it suddenly sweeps round the low group of hills to which Durgapur (1,186 feet) gives its name, and runs a few miles south of Chirkunda and Barakar, at the trijunction of *Parganas* Dumar-kunda, Chaurasi and Shergarh. Just above this point it receives

from the west its only important tributary, the Khudia, which takes its rise in the extreme west of the district between the Parasnath and Tundi ranges, and drains the whole country between that range and the high ridge which marks the northern limit of the Jharia coalfield. It meets the Damodar river near Chirkunda.

THE DAMODAR RIVER.

The Damodar, as already stated, formerly divided Dhanbad from the Sadar subdivision of the old Manbhum district (now in West Bengal); its course through the district is almost due east. On its entry into the district it receives from the north the waters of the Jamunia river a stream which marks the boundary between Hazaribagh and Dhanbad districts. Of its other affluents from the north the Kani river, which takes its rise in the foot hills below Parasnath and cuts through the coalfield area is the most important. Forty-eight miles of this river flows through the district.

It is necessary to give some description of this river. The Damodar rises in Chotanagpur hills about 200 feet above sea-level. Flowing north-east till it meets the Barakar, it runs south-east. After a run of about 563 km (350 miles) in all, the river falls into the Hooghly just above the "James and Mary" sands. The Damodar runs for over 290 km (180 miles) in Bihar before entering West Bengal. Below Ranganj, the Damodar flows through deltaic plains, takes an abrupt turn in the vicinity of Burdwan and flows south. It soon enters the Hooghly district and throws off a number of channels before joining the Hooghly.

The Barakar is the most important tributary of the Damodar.

RAINFALL AND CATCHMENT.

Heavy rainfall over the Damodar Valley is generally caused during the passage of cyclonic depressions following in the north-west direction. The depressions are formed in the Bay of Bengal during the monsoon months, June-October. Sometimes depressions formed over the land mass also cause heavy precipitation.

The average annual rainfall over the upper Damodar basin is 127 cm (50 in.), and the deltaic area receives a slightly more precipitation.

The total catchment of the Damodar is about 22,015 sq. km. (8,500 sq. ml). The watershed above the confluence of the Barakar and the Damodar is fan-shaped and forms nearly 80 per cent of the total area, conducive to heavy concentration of floods. The catchment beyond the confluence is narrow—about 16.1 km (10 miles) wide and 241 km (150 miles) long.

The basin is generally denuded of forests and vegetation cover. Land management is poor and the soil exposed. Consequently, heavy monsoon precipitation results in severe land erosion. The silt

washed into the river precipitates on the bed. The flood heights progressively increase and spill over the land on either bank.

FLOODS AND EMBANKMENTS.

Raising of embankments was the only flood protection device till very recently. In earlier days bundhs were raised on the Damodar in an *ad hoc* manner to protect individual interests rather than for general public purposes. A land-owner whose land was threatened by floods would construct a bundh to protect his land from inundation, with the result that the flood water would attack some other point downstream. Thus the process continued till the river banks were protected by a series of regular embankments. Before the last century, however, these were neither so extensive nor so strong as to check the fury of the floods.

The earliest recorded Damodar flood occurred in 1770 which caused widespread damage to rice crop, resulting in famine. The flood occurred on 29th September when the Damodar waters rose to the left embankment crest level near the western extremity of Burdwan town. The embankment gave way. Repairs to the embankment were immediately attended to, but a few days later another flood of greater magnitude destroyed the entire embankment and washed away Burdwan town. Floods of 1787 also did considerable damage to houses and took a heavy toll of human lives and cattle. Again in September, 1823 the Damodar played havoc, this time on embankments.

The floods of 1855 inflicted considerable damage to the right embankment of the Damodar. The Government decided to abandon the right embankment and extend and reinforce the left embankment to provide complete immunity for the country north of the Damodar from the floods.

Floods continued to recur and the more recent ones were in 1913, 1935 and 1941. The last two registered a peak discharge of 650,000 cusec at Rhondia.

SHIFTING DAMODAR.

The Damodar in the plains beyond Silna has been trying to fan out and form a delta by throwing a number of branch channels with its apex near Burdwan. The delta is bounded on the north by the Behula channel. In the plains below Silna, the river had tried to throw a number of branch channels on the right bank; but all of them again got lost in the main river a little lower down. In this process the fertile soil of the Rayna *Thana* has been rendered waste with deposit of coarse sand.

Before the 18th century, the Damodar joined the Hooghly at Nayasarai. Due to several breaches in the right embankment by a series of heavy floods in the eighteenth century the river mouth

moved further and further down the Hooghly. The total movements work out to about 113 km (70 miles). This continuous change in the course of the lower Damodar to the south was probably accelerated after the removal of the right embankment, resulting in the unrestricted spill on the western side. In 1865 a great flood burst through the right bank at Begua and opened out a new channel which runs parallel to the main stream at a distance of about 3.2 km (2 miles) and joins the Mundeswari river. The discharge in the new channel increased gradually at the cost of the main river. So a cut was made linking the old and the new channels; the cut was named Muchi Hana. As a result of these changes, the Damodar now runs through Muchi Hana and the Mundeswari to join the Rupnarain near Gopigunj. The tail reach of the main river, now called the Amta channel has gradually shrunk and carried hardly five per cent of the flood discharge of the upper Damodar.

Due to frequent changes in the river course, the Damodar has left many stagnant water pools which breed mosquitoes spreading one of the worst kinds of virulent malaria, called the Burdwan fever. It takes a heavy toll of lives every year.

BIRTH OF D. V. C.

The removal of the right embankment gave only temporary relief. The disastrous 1898 floods forced the authorities to search for detention dam sites in the upper valley. Investigations were initiated and reports submitted to the Government but no decision was taken. Neither the 1913 nor the 1935 floods which caused disaster to Burdwan and the East Indian Railway altered the situation. Then followed the 1943 floods which breached the left embankment at Amirpur, overtopped the Grand Trunk Road and damaged the railway embankment. This cut off Calcutta from North India during a critical phase of World War II. The Government then appreciated the necessity of taming the Damodar at any cost. An Engineer from U. S. A. was brought to India for drawing up a scheme for flood control on the lines suggested by the 1944-45 Damodar Flood Enquiry Committee. An integrated scheme was drawn up, and the Damodar Valley Corporation was set up in 1948 to implement the scheme. The results of the D. V. C. scheme already apparent, will be increasingly evident as the years pass.

D. V. C. PROJECT.

The D. V. C. projects were conceived as an integrated whole for the unified development of the Damodar Valley area. The flood that occurred in the Damodar Valley in 1943, though of a magnitude of 99,110 (3.5 lakh) cusec only, caused extensive damage to private and public property and hampered the war efforts of the Government.

The services of Mr. W. L. Voorduin, a senior Engineer on the staff of the Tennessee Valley Authority, were secured by Government to study the problems of the Damodar and to make recommendations for its comprehensive development. Mr. Voorduin presented his report in August, 1945.

The primary consideration in the plan of development as drafted by Mr. Voorduin was flood control though it was deemed desirable that as far as possible the system of dams should be capable of producing the largest quantity of power which should be made available and used to the maximum extent possible and to regulate the flow of water for irrigational purposes.

Mr. Voorduin's scheme envisaged *inter alia* the construction of eight storage reservoirs and weir across the Damodar and a network of canals providing perennial irrigation to about 3.1 lakh (7.6 lakh acres) in the lower valley in West Bengal.

TWO PHASED SCHEME

Soon after the Damodar Valley Corporation came into existence, it decided to execute the scheme in two phases. the first phase covering four dams with connected hydroelectric stations, namely, Tilaiya, Konar, Maithon and the Panchet and, in addition, a thermal power station at Bokaro with transmission system and the irrigation barrage at Durgapur, and canal sited. The rest of the four dams, namely, Balpahari, Aiyar, Bokaro and Bermo, were to form the second phase.

Two of these dams Maithon and Panchet are located in Dhanbad district.

Besides the above rivers there are other small rivers also in the district. Some of them are as follows :-

The Gobai river.—It starts from western and southern corner of the district near village Pichudih and meets the Barakar river near Bhojudih. It runs for about 28 miles in Chas and Chandankeary police-stations of the district.

The Ijri river.—It starts from the middle of the villages Karmagarh and Asanbani and meets the Gobai river near Bhojudih. It runs for about 14 miles from west to east in Chandankeary P.S. of the district.

The Khudia river.—It starts from the middle of the villages Parasbani and Asanbani and ends at east and south side of the district near Chanch and the Barakar river. It runs for about 29 miles in the district. Khudia river emerges from the confluence of the streams, Panjaria and Jauria coming from the north and west respectively.

LAKES, TANKS AND RESERVOIRS.

Topchanchi Dam,

The construction of this dam was started in October, 1915 and was completed on 15th November, 1924 at a total cost of Rs. 78 lakhs. The dam is 9,000 feet long and has a height of 72 feet above the lowest river bed level. The catchment area of the lake is 5 square miles, and the water spread area of the tank is 306 square miles. It has a storage capacity of 1,295.11 million gallons. The water thus stored is used by the Jharia Water Board for the supply of water to the coalfield area and the supply is on the gravity supply system and supplies 2.40 million gallons in 24 hours.

The water is supplied after filtration. The type of filtration is slow sand filtration and there are eight filter beds. The total filtering capacity is 2.4 million gallons in 24 hours.

The water in this reservoir mainly comes from Lalki at a distance of eight miles to the north-east and from Dholkatta at a distance of six miles to the north-west. Special channels have been constructed to bring water from Lalki and Dholkatta in the Parasnath range. Lalki and Dholkatta are in the district of Dhanbad.

This dam is entirely meant for the supply of water for domestic purposes for the entire Jharia coalfield area including Dhanbad town.

Panchet Dam.

The dam at Panchet hill is the latest and the largest dam of the D. V. C. Project. It is built on the river Damodar itself. It is a four mile long dam of earth and concrete running north to south with a vast reservoir full of water and a hydel station producing 40,000 K.W. of power. It commands a catchment area of 4,234 square miles receiving a rainfall from 45 inches to 64 inches annually. The area of the reservoir to the top of the gates' level is 55 square miles. The dead storage water level is 392 feet, normal monsoon storage level is 410 feet and the flood regulation level is 435 feet above sea level. The work on the dam commenced in November, 1952 and was completed in July, 1959.

Due to construction of Panchet dam 41,461 people were displaced from 19,046 acres of land and 2,119 houses. All the 10,339 families involved have accepted cash compensation for lands and houses.

Maithon Dam.

A full description has been given under Maithon in Places of Interest.

Tanks.

Besides the above reservoirs there are many tanks in this district. The location and the area of the important tanks in this district are given below:—

Name of police-station.	Name of Village.	Area of tank.	Purpose for which mainly used.
Acres.			
1. Chas	Chapa tank ..	30.88	Fishery.
2. Do. — ..	Bahudih ..	22.24	Ditto.
3. Do.	Bharra] —	20.27	Ditto.
4. Chandankeary ..	Lalpur ...	30.63	Ditto.
5. Nirsa	Asanlia ¹ —	20.20	Fishery and Irrigation.
6. Gobindpur ..	Rislay <i>bandh</i> near Govindpur.	50.00	Ditto.
7. Dhanbad — ..	Baker <i>Bandh</i> , Dhanbad.	40.00	Fishery.
8. Nirsa	Pandra —	40.00	Fishery and Irrigation.

Springs and other Water Resources.

There are quite a few small springs scattered in the rural areas which form sources of water-supply to the villages. They are commonly known as *Darhis*. Some of them are perennial and if the water discharge is sufficient, villagers put small earthen dams for storing water for irrigating their lands.

Regarding underground water resources, there has not been any scientific survey. Certain features regarding the ground water conditions may, however, be inferred from the nature of the rock formations. The Archaean crystallines constituting the central and southern portions of the district are generally impermeable excepting within the zone of weathering. Ground-water is confined in these rocks to open joints, zones of shear and such other planes of weakness. The Archaean country is generally unsuitable for putting down tube-wells. Where large supplies of water are required it would be advisable to construct either large tanks or impound water by constructing dams and barrages across suitable streams.

The Gondwana sediments occur in basins which should have given rise to favourable artisan conditions but for the highly compacted nature of these sediments. Even sandstones in these basins are not generally known to be very good aquifers due to their being felspathic. The numerous sands and seams of clay also reduce the water-yielding capacity of these sedimentaries. The actual

ground water conditions in the coalfield can be assessed only after a detailed systematic survey. The chief sources of water-supply in the coalfield are the Ragdaha reservoir at Topchanchi which supplies drinking water to Jharia and surrounding areas, the Damodar river and the working and abandoned coal mines where much water is known to collect. It is, however, believed that there are underground water resources of the district which cannot be said to be adequate. The enormous expansion of the industrial zones and the mining areas has created quite a problem and sooner or later the Topchanchi dam and the reservoirs will have to be supplemented. There is an acute water scarcity in the district during the summer months and many of the villages do suffer for want of adequate water. Even water scarcity is felt in Dhanbad town. The few tanks and water reservoirs at Maithon and elsewhere are hardly adequate for a perennial supply of fish to Dhanbad and the other towns. There is a constant demand for fish the price of which has considerably gone up throughout the district. Some of the tanks are not being properly utilised for fishery. Excavation of tanks has completely stopped. Previously tanks used to be excavated by local zamindars on ceremonial occasions or as a mark of charity.

The want of water resources also affects cultivation. The terrace cultivation is a common feature and the up-lands hardly get sufficient water. The lower regions are more fertile because they get more of the rain water. Irrigation through channels is almost completely unknown excepting where in the areas which get water from the dams. The want of sufficient water also affects the lands of Dhanbad and other towns. There are hardly any green vegetable belts which should have been the usual feature of expanding urban areas.

THE GEOLOGICAL FORMATIONS AND THE ECONOMIC MINERALS OF DHANBAD DISTRICT.*

Area.

The Dhanbad district occupies an area of 1,114 square miles.

From a geological point of view, Dhanbad district can be divided into northern half which consists entirely of ancient crystalline rocks, and the southern half which is occupied by the great coal basin of Jharia in the west and the Cis-Barakar portion of the Raniganj coal basin in the east, with intervening area of crystalline rocks.

Topography.

The topography of the southern half of the area is undulating and rather dull with very few conspicuous features. The northern portion is, however, characterised by greater variation in relief.

* This paper was contributed by Prof. N. L. Sharma, Prof. of Geology, School of Mines, Dhanbad, to me and published in *The Ismag*, Vol. No. XI, 1953-54 (P.C.R.C.)

Apart from the several low ridges which occur north of the Grand Chord Rly. line between Pradhankhanta and Gomoh stations, the highest peak of Parasnath (4,480 ft. above sea-level) sends out its spurs up to north-western corner of the district where the famous Topchanchi dam is built to supply drinking water to the Jharia coal-field. The more or less continuous ridges of the Parasnath range run for a long distance eastwards from this place and form the northern hilly portion of the district. These ridges vary in altitude from 1,200 to 2,500 above sea-level.

The general slope of the country is towards south and south-east, so that most of the tributaries of the Damodar river flow in these directions. The Damodar river is itself flowing from west to east, along the southern boundary of the district, but its course has been determined more or less by the great boundary fault of the Jharia coalfield.

The main tributaries of the Damodar river, which flow in from north are the Jamunia river which marks the north-western boundary of Dhanbad district, and the Barakar river which marks the eastern boundary. Other tributaries which flow from the north are, beginning from west, Katri river near Katras with its western tributary Khudia, Chinadi south of Dhangri ridge, east of Dhanbad, and the main Khudia river flowing south-east-wards, north of Govindpur, with its tributary Pusal. Due to the prolonged denudation to which this region has been subjected, there is not much correspondence between the structural features and the directions of drainage in case of rivers other than the Damodar.

Most of the hills and ridges of the area owe their preservation due to the greater hardness of the rocks which constitute them compared to that of the surrounding rocks. The common types of rocks which give rise to outstanding hills are the metamorphic rocks like epidiorites, amphibolites, metadolomites and metanorites. Some of these hills may thus be regarded as igneous in origin. A few ridges are composed of quartzites, granulites and micaceous schists and gneisses, and they may be regarded as relict type of ridges which have suffered less erosion than the surrounding area. The veins of white quartz (often brecciated) which are so common in the metamorphic terrain of the district, also form low ridges due to their resistance to denudation. These ridges may, however, be regarded as tectonic in origin as they usually indicate fault zones.

Inside the coal basins, the sandstones form long low ridges with characteristic scarp and dip slopes, and the accompanying shales and coal seams form depressions running more or less along the strike direction. The so-called "burnt" outcrops of coal steams and dolerite dykes also form small mounds and ridges.

Climate.

The climate of Dhanbad district is very pleasant especially in the cold weather months—November to February—during which the

temperature (according to the last three years' records of the Hydro-meteorological Observator at I. S. M. and A. G., Dhanbad) varies from the lowest minimum of 47°M to the highest maximum of 94°F . After February the climate becomes warmer and warmer until the rains break in the middle of June. The temperature during these four months March to June varies from the lowest minimum of 56°F to the highest maximum of 114°F . During the remaining months, July to October, which include the rainy season, the temperature range is from the lowest minimum 59°F to 97°F . The average annual rainfall of the area is $55''$ most of which is precipitated during the rainy season—middle of June to middle of October. The rainfall around Parasnath hills is reported to be more than the average. In 1953, we had more than $69''$ of rainfall at Dhanbad till the end of September, the maximum downpour of rain in 24 hours being $6.48''$ on 3rd July, 1953.

Ancient Crystalline Rocks.

The oldest geological formations of the Dhanbad district are composed of crystalline metamorphic rocks which belong to the Dharwar system (Archeans) in Indian stratigraphy. In these formations are found rock types of both sedimentary and igneous origin. The sedimentary rocks were originally deposited as sandy, clayey and calcareous sediments, more or less impure. These sediments were consolidated as sandstones, shales and limestones of different composition and then were subjected to regional metamorphism and converted into quartzites (granulitic and schistose varieties), micaeous schists, crystalline, limestones, calc-silicate granulites and calc-gneisses and in some cases to amphibolites and hornblende schists. The last two rock types may in part, be contemporaneous lava flows or sills subsequently metamorphosed. All this happened in the 'Dharwar' period, more than 900 years ago.

The above metamorphosed sedimentary rocks were then intruded by magmas of both basic and acid composition, possibly in the earlier post-Dharwar times. The basic magma was of doleritic and noritic composition and is now represented by intrusive dykes and masses of metadolerites, metanorites and some of the epidiorites. These rock types usually occur as prominent hillocks in the area. The acid magma which intruded later than the basic magma had given rise to the granite pegmatites, aplites and some quartz veins of the area.

In the later post-Dharwar times, the metamorphosed sedimentary rocks and the igneous intrusives were subjected to the injection metamorphism due to which the rock types were perminated, soaked, feldspathised, homogenised and granitised into streaky, augen and injection gneisses. Some of the gneisses and epidiorites of the area show typical rapikivi structure (ovoids of potash feldspar surrounded by rims of sodalime feldspar).

Not much work has been done on the crystalline metamorphic rocks of Dharwar age of this area since the time of Ball (Mem. Geol. Surv. India, 1881, Vol. 18, pt. 2) who surveyed geologically Manbhum and Singhbhum areas of Bihar. During recent years, the students and staff of the Geology Department of the Indian School of Mines and Applied Geology have carried out some geological mapping of the metamorphic area bordering the Jharia coal basin and a tentative classification of the Dharwar and post-Dharwar rock types of this area is shown in the following Table no. I.

TABLE NO. I.

The Ancient Crystalline Rocks of the Dhanbad district.

Later post-Dharwar Injection complex	{ Streaky, injection, augen and sillimani to gneisses. { Rapikivi-bearing gneisses and epidiorites.
Earlier post-Dharwar Intrusives	{ Granites, pegmatites, aplites and some quartz veins. { Metadolerites and metanorites with or without olivine.
Dharwar	{ Gneisses, amphibolites, epidiorites and hornblende-schists. { Quartzites, (granulitic and schistose) granulites, and calc-gneisses. { Micaceous Schists.

Rocks of Coal-basins.

The above ancient rock types form the basement rocks of the Dhanbad district and it was over these rocks that the Lower Gondwana group of sedimentary strata including the coal bearing beds were laid down. These sediments are river deposits and were deposited in slowly sinking faulted troughs (basins) in the more or less then flat country composed of Dharwar rocks, so that it was possible for the accumulation of several thousands of feet of river and stream deposits in definite linear tracts like the Jharia and the Raniganj coal-basins. At the commencement of the Lower Gondwana period (some 300 million years ago), there was a Glacial Age in India as is evident from the glaciated boulders deposited at the bottom of the Gondwana system of rocks and the presence of undecomposed felspar grains in the associated sandstones above them. The climate rapidly became much warmer and gave rise to the super-abundant growth of vegetation which supplied the materials for the formation of coal seams in the succeeding series of rocks in the Jharia coalfield and in the Cis-Barakar portion of the Raniganj coalfield.

The sedimentary rocks of the Gondwana coalfields have been classified mainly on the basis of their lithological characteristics and the nature of plant fossils found in them. Table no. 2 shows the stratigraphical formations of the Jharia coalfield.

TABLE No. 2.

The Geological Formations of the Jharia Coalfield.

Superficial deposits.		Recent.	Soil and alluvium of rivers and streams.
Igneous intrusives.	—	Cretaceo-Eocene Lower Jurassic.	Dykes of basic igneous rock, dolerite sills and dykes of ultrabasic igneous rocks, mica-peridotites and lamprophyres.
Lower Gondwana System.	Upper Permian.	Raniganj series (upper coal measures 1,840' thick).	Brown medium-grained sandstones; bands of sideritic sandstone weathering yellow; carbonaceous and micaceous shales; fire-clays and 9 coal seams.
	Middle Permian.	Barren measures (2,000' thick).	Laminated and massive sandstones; shales with nodules of ironstone (clayey siderite) or limonite at some places.
	Lower Permian.	Barakar series (lower coal measures 3,000' thick).	White coarse-grained micaceous sandstones; ferruginous sandstones; carbonaceous and micaceous shales; fire-clays and about 25 coal seams.
	Upper Carboniferous.	Talchir series (400'—800').	Boulder bed; green fine-grained sandstones; green shales showing nodular and needleshaped weathering.

Great unconformity.

Dharwar and post-Dharwar crystalline rocks (as listed in Table no. 1).

The Cis-Barakar portion of the Raniganj coal-basin has also got similar stratigraphical succession as the Jharia coalfield except that the Raniganj series of rocks do not occur in that part and the dykes of dolerite have not been found there.

Dykes and Sills of Coal-basins.

The sedimentary rocks of the Jharia and Raniganj coal-fields were intruded by a series of dykes and sills of ultra basic igneous rocks, possibly in Lower Jurassic times. These rocks have been termed as mica-peridotites (and as 'mica traps', a convenient mining term). Recent petrological studies have revealed that many of these rocks are lamprophyres, amongst which mica-lamprophyres and leucite-lamprophyres are the common types. Olivine (usually as

pseudomorphs), biotite (as reddish-brown flakes) and apatite (as needles) are the common mineral constituents observed embedded in the highly altered matrix consisting of secondary minerals, like serpentine, chlorite, calcite, kaolin, limonite, etc. Some of the micaperidotites are exceptionally rich in apatite (phosphate of lime) which may form 11 per cent of the rock.

Fresh specimens of lamprophyres are rare to find except underground in the coal mines. Usually the rock is weathered into a soft and porous, brownish-red, purple or yellowish rock. In some cases, iron has been leached and the rock is weathered to a vesicular white or grey coloured rock. The intrusions of lamprophyres occur more commonly as sills running parallel to the bedding planes of the sedimentary strata rather than as dykes cutting across them. The intrusions are usually more widespread in the coal seams, especially of the Barakar series, where they usually occur as lens-like masses, thin flat sheets or anastomosing vein-like sills, at the junction of the coal seams and the underlying sandstones or in the coal seams themselves. They have been called as the 'pest' of the coal seams as they have partially caked the coal of the seams, for short distance on either side of the sills, into a hard dense material, locally called 'natural coke', 'burnt', 'coal', or 'jhama', which shows characteristic columnar structure but is worthless as a fuel.

The other intrusions are the dykes of basic igneous rock dolerite. These intrusions are more regular than those of mica peridotites and lamprophyres, and unlike the later, they never occur as sills and have not done much harm to the coal seams which they cut across. The dolerites are massive medium grained rocks showing black to dark-grey colour on fresh surface. They show prominent rectangular jointing and spheroidal or onion-like weathering. These rocks are composed of minute white or grey laths of lime-soda-felspar (labradorite), black grains of pyroxenes (pigeonite and augite) and glass (mostly devitrified). The dolerite dykes are later in age than the lamprophyres and mica-peridotites and are now regarded as belonging to the same geological age as the Deccan Traps, i.e. Upper Cretaceous to Lower Eocene.

Structure of Coal-basins.

The Lower Gondwana sedimentary rocks of the coal-basins lie unconformably over the older crystalline rocks of Dharwar and post-Dharwar age. The general structure of the coalfields is basin shaped. The Lower Gondwana strata with their associated coal seams therefore dip inwards from their outcrops towards the centre of the basin. Though the Cis-Barakar portion of the Raniganj coal-field is only a part of the main basin, there are a few local small basins in Barakar coal measures, like that of Shampur seams. These basins owe their synclinal origin partly to the swinging round of the strata in the vicinity of the great boundary fault which runs along the southern border of the basin.

The main axis of the synclinal Jharia coalfield-basin runs W. N. W.-E. S. E. and is pitching gently towards west, as can be seen by the dips of the Raniganj strata along the Jamunia stream. This line of axis is neither straight nor curved in a simple manner but it is itself corrugated due to the forces probably coming from east to west.

Recent Formations.

The recent formations which form superficial deposits are the alluvial sands of rivers and streams and the residual soils derived from the weathering of bed rocks. Thick deposits of recent alluvial sand occur adjacent to the banks of the Damodar and Barakar rivers and the Jumunia, Khudia and Pusal streams. The Damodar sand is being used at places for stowing the goaf areas in the important coal mines of the Jharia coalfield. In addition to recent alluvium, there are patches of older alluvium on the banks of the Damodar and Barakar rivers, lying either well above the present high flood level of the rivers or in channels now more or less abandoned due to the shifting of the river course.

The nature of the soil depends upon the chemical composition of the bed rock from which it is formed, the climate of the region and the topography of the place. Coarse gritty soil admixed with big fragments of rocks is formed from the weathering of pegmatites, quartz veins and conglomeratic sandstones, whereas sandy soil is characteristic of granitic rocks and sandstones. The basic igneous or metamorphic rocks and ferruginous sandstones give rise to the reddish brown ferruginous soil, sometimes lateritic. The crystalline limestones and calc silicate granulites give calcareous soils. Both the above types of rocks are also responsible for the formation of small nodules of 'Kankar' (calcium carbonate) in the soil. The fine-grained shales give loamy soil and carbonaceous shales and coal seams, dark-brown to black soil. The amount of 'humus' (dark-brown decayed vegetable matter) present in soils is responsible for the dark-brownish colour of many of the paddy field soils. At some places, white efflorescence of 'reh' (mixture of sodium sulphate, sodium carbonate, etc.), is also found as thin encrustation on the surface. It is deposited by the evaporation of alkali salts by the percolating water which is brought up from below by capillary action during the dry season.

Economic Minerals.

Though hardly a dozen minerals of economic importance occur in the Dhanbad district it is one of the premier districts of India so far as the most important fuel minerals coal is concerned. The Jharia coalfield is our storehouse of good quality coal, the reserves of which are estimated (up to a depth of 2,000') to be more than 1,000 million tons, about 75 per cent of it being good quality coking coal. This field is responsible for about 40 per cent of the total coal annually produced in India. In addition to this coalfield, the

Cis-Barakar portion of the Raniganj coalfield lying in this district, also produces appreciable amount of coal. Separate statistics for this part of the Raniganj coalfield are, however, not available but the Raniganj coalfield as a whole supplies about 30 per cent of the total annual output of Indian coal. Next to coal in this area are the deposits of fire-clay associated with the coal measures. Other economic minerals are building stones, road metal and railway ballast, silica (quartz and sand), 'kankar', mica, steatite (soapstone), china clay, graphite, iron ore and a few mineral springs.

Coal.

Coal seams occur in the Jharia coalfield in two series of strata-Barakar series or the lower coal measures and the Raniganj series or the upper coal measures. In the Cis-Barakar portion of the Raniganj coalfield, the coal seams are all of the Barakar series. The Barakar series coals are generally coking and they contain a relatively higher proportion of fixed carbon and low percentage of volatiles and moisture than the Raniganj series coals. The better quality coals of the Barakar measures are excellent steam coals and form hard metallurgical coke. The Raniganj series coals are high volatile, long flame non-caking or poorly caking gas coals.

There are more than 25 coal seams of over 4 feet thickness in the Barakar series of the Jharia coalfield. The better quality Jharia coalfield seams range in thickness from 30 ft. downwards. The coal seams in the Barakar series of the Jharia coalfield have been numbered as I to XVIII, the first seam being the bottom-most and hence the oldest seam, and the eighteenth seam, the youngest of the seams. Any new seam since discovered is denoted by assigning a suffix like A. B. etc. or "special" to the number of the seam next below it. These seams have been divided by Dr. Fox (Mem. Geol. Surv. India; 1930, Vol. 56), into the following four stages, based on the predominating types of strata and the quality of particular seams found in them (Table no. 3).

Table no. 3.

Coal seams of the Barakar Measures of Jharia coalfield.

Jorapokar-Bhagaband-Phularitand stage, containing seams nos. XVI to XVIII which are mainly of superior quality coking coals.

Jealgora-Barari-Bhaura stage, containing seams nos. XIII to XV which are also of superior quality coking coals.

Nadkharki-Gareira-Tisra stage, containing seams nos. VIII to XII of which the last seam is of good quality and others of moderate quality coking coal.

Matigara-Muriadih-Golakdih stage, containing coal seams nos. I to VII which are mainly of inferior quality coal.

The coal seams of Raniganj series are of much less importance than those of the Barakar series. In the lower portion of the series—the Bamangora-Murlidih stage of the coal measures, there are seven seams of which three are workable with an average total of 15 ft. of coal, whereas in the upper portions of the series—the Telmucha-Pathargaria stage, there are three seams of which the topmost (7 ft.) is workable.

In the Cis-Barakar portion of the Raniganj coalfield, the coal seams are all of the Barakar series. The seams of this field are not properly correlated and numbered as those of the Jharia coalfield, but are denoted by the names of the important localities where they are worked. Seven main coal horizons are recognised by Dr. Gee (Mem. Geol. Surv. India, 1932, Vol. 61; and Rec. Geol. Surv. India, 1945, Vol. 76. Bulletin-16) in the Barakar coal measures of the Raniganj coalfield. These horizons are shown below in Table no. 4.

Table no. 4.

Coal seams of the Barakar Measures of Cis-Barakar Raniganj Coalfield.

A Coal seam (3 to 4 ft. thick).

Shampur no. 1 seam and Chanch-Dumarkanda seam.

Shampur nos. 2, 3 and 4 seams and Kharbari seam.

Shampur no. 5 and 6 seams, Chatabar seams and Patlabari-Laikdih seam.

Rangamati-Nirsa-Gopinathpur seams.

Kanauri-Birsingpur, Bindrabanpur-Siulibari and Kapsara-Kalimati seams.

Pusal—Merthadiah seams.

Fire-clay.

Fire-clay suitable for the manufacture of fire-bricks occurs as layers or thin beds in the coal-bearing sedimentary formations—the Barakar and the Raniganj series of the Jharia coalfield and the Barakar series of the Cis-Barakar Raniganj coalfield. Shri D. R. S. Mehta of the Geological Survey of India has recently carried out a survey of the fire-clay deposits of these coalfields. According to his report (*Mineral Resources of the Damodar Valley* by Shri V. R. Khedkar, 1950, D. V. C. publication) good fire-clay occurs in the Barakar coal measures of the Jharia coalfield in several localities which can be included in the following five areas, the approximate total reserves up to a depth of 20' being about 5.3 million tons:—

Nadkharki—Bhaldih area.

Sonardih—Tetulmari area.

East Kenduadih—Kusunda area.

Tisra—Suranga area.

Pathardih—Chasnala area.

In the Cis-Barakar Raniganj coalfield, good fire-clay occurs in Nirsachatti and Mugma-Kumardhubi areas which have a total reserve of about 1.8 million tons up to a depth of 20'.

Building Stones.

Amongst the rocks used for building purposes in this area, the massive sandstones of the Barakar measures of the Jharia coalfield, and the Cis-Barakar Raniganj coalfield, provide very good building material and they have been used in the construction of bridges (including the Grand Trunk Road bridge over the Barakar river), culverts and buildings and also in the construction of shaft-linings and machinery-foundations in the coalfields. Barakar sandstones have been used in the famous Topchanchi dam and also in the old temples near Barakar town. They are also reported to have been used in a portion of the Calcutta High Court. These sandstones are also quarried as mill-stones.

Other rocks which are used for building purposes are the hard sandstones of Talchir and Raniganj series, and the quartzites, streaky gneisses, hornblende-schists and other metamorphic rocks of the Dharwar system which may be easily worked.

Road Metal and Railway Ballast.

The rocks which are being used for this purpose are the metadolerites, epidiorites, hornblende gneisses, quartzites, granulites and fine grained streaky gneisses of the Dharwar System, the dolerites of the dykes found in the coalfields and the quartz of the quartz reefs which traverse the metamorphic areas of the district. The hardest rocks of the area are the metadolerites which together with the epidiorites and some amphibolites, have been used after crushing as cement concrete aggregates at the Sindri Fertilizer Factory. The calc-silicate granulites and actinolitic gneisses have been used after breaking into fragments as rock aggregates for road concrete in Dhanbad area. Vein quartz is extensively quarried for road metal and ballast.

Silica (Quartz and Sand).

Silica in the form of vein quartz is found in abundance in the areas occupied by crystalline rocks. The veins or reefs of this quartz are unexpectedly quite barren, i.e., devoid of any trace of metalliferous minerals. Many of these veins are regarded to be much younger than the Dharwars and are clearly related to the great faults traversing the area. Some of these quartz veins are definitely formed by deposition from descending (meteoric) waters. These veins show crustified banding, composed of aggregates of quartz showing different degrees of crystallisation and habit; and though this quartz is often superficially stained with red ferruginous matter, the veins can easily yield material of sufficient purity to be used for glass manufacture. Only an economical process of crushing this quartz without admixing it with iron matter from the mill during the

process, is to be evolved. Some of the large quartz reefs like those near Pradhankanta Railway station and near Dhanbad town are likely to give appreciable tonnage of the material.

In addition to the vein quartz, some of the white Barakar sandstones and Dharwar quartzites can also yield white glass-sand after crushing, sieving and washing. They can also be used in the manufacture of refractory silica-bricks.

The sands of the Damodar, Barakar, Jamunia and other rivers are used in mortar and concrete. These rivers can easily supply the quantity of sand required for stowing purposes in the underground coal mines area. With the construction of the various dams of the Damodar Valley, a large proportion of sand will, however, be deposited in the reservoirs, and with the reclamation of the waste lands and control of soil erosion, the sand in the bed of the Damodar river will in future not be fully replenished annually and thus will become a limited asset.

'Kankar'.

Small deposits of 'Kankar' (calcium carbonate) occur on the bank of Barakar river and east of Dumarkanda. In addition, as a result of weathering of (i) the sideritic sandstones of the Raniganj series, (ii) the mica-peridotites and lamprophyres of the sills, and (iii) the calc-gneisses, calc-silicate granulites and amphibolites of the metamorphic areas, small irregularly-shaped nodular fragments of 'Kankar' are disseminated over the surface of soil overlying these rocks. Some of these deposits have been used for lime burning.

Mica.

The older view that the mica belt of Bihar is 60 miles long and 12 miles wide, extending from Gaya district from the west across the Hazaribagh and Monghyr districts into Bhagalpur district on the east, needs revision in view of the fact that mica has been obtained recently from other areas in Bihar outside this belt. In the Dhanbad district, it has been worked at several localities (Dunn, Mem, Geol. Surv. India, 1942, Vol. 78, p. 183). The important areas in this district where mica occurs lie east of Baliapur, north-east and south-east of Chandankeary and north of Jhalida Railway Station, within 10 miles distance in each case.

Steatite Soapstone.

Steatite is a massive compact variety of mineral talc, and soapstone is an impure form of steatite, used since ancient times, as potstone. Purer variety of soapstone is used as a refractory material and as polishing agent. Steatite has been found in the Pendra Kismat estate ($23^{\circ} 48' : 86^{\circ} 43'$) and has been used for the manufacture of bricks in the alkali furnaces of Paper mills.

Iron ore.

The ironstone shale series, now termed as Barren Measures, contains at places lenticles and nodules of iron-stone (clayey siderite,

iron carbonate) often altered near the surface to hematite (iron oxide) and limonite (iron hydroxide). The bands of iron-stone are, however, very irregular in habit. They occur both in the Jharia coalfield and in the Raniganj coalfield but are more abundant in the latter field. The site of the Kulti Iron Works near Barakar was originally chosen on account of the proximity of both coal and the deposits of these ironstone nodules which occur in abundance in the iron-stone shales running east and west of the Works. For many years the iron-stones, from these beds were the only supply of ore, but the discovery of exceptionally rich iron-ore (hematite) of Singhbhum has made these deposits now uneconomical to work.

In addition to the iron-stones of Barren Measures, ferruginous lenticles and bands are also found in the Barakar and Raniganj series and these had been worked in the distant past by the local smelters as is evident from the heaps of iron-slag found here and there near the outcrops of these bands.

Some of the streams which flow over amphibolitic rocks of the area contain lot of black sand in their beds which is rich in magnetite (magnetic iron oxide) but at present it is not of any importance.

China Clay.

This ceramic clay has been found at Mahatamarra ($23^{\circ} 25' : 85^{\circ} 55'$), north-west of Jhalda Railway Station.

Graphite.

It has been found north of Jaipur Railway Station (Purulia-Ranchi line). The mineral is used in pencils in refractory crucibles, as lubricant and also in electrical industry.

Mineral Springs.

There are a few mineral springs in the area and many of these occur along the fault planes and are situated in the metamorphic rocks near the Damodar river along the faulted boundary of the coalfields. The important springs near the western border of the Raniganj coalfields are Jherbari ($23^{\circ} 42' : 86^{\circ} 46'$), Tathi ($23^{\circ} 41' : 86^{\circ} 48'$) and Tantloi ($23^{\circ} 41' : 86^{\circ} 44'$). The last one is situated on the south bank of the Damodar river and is said to have a temperature of 190° F (88° C).

There is another hot spring on the north bank of the Damodar river about $5\frac{1}{2}$ miles east by north of the eastern termination of the Jharia coalfield at Sheopur ($23^{\circ} 40' : 86^{\circ} 36'$).

Far away from the Damodar river and near the northern boundary of the district is another hot spring at Charakh ($24^{\circ} 1' : 86^{\circ} 25'$). Most of these springs are sulphurous and are said to have medicinal values.

Conclusion.

Most of our knowledge of the geological formations and the economic minerals of the Dhanbad district is confined to the easily

accessible portion of the area in and at the outskirts of the coalfields. In course of time as the comparatively inaccessible hilly tracts, north of the Grand Trunk Road in this district, are geologically surveyed, there may be more information available about the deposits of some other minerals like China clay (Kaolin) known to occur near Tundi, and Garnet, a common mineral in the metamorphic rocks of the Parasnath hills.

VEGETATION.

Vegetation of this district is of profound interest, consisting of a number of closely related process, so important that each form a special field of study. Attention has been particularly paid to those ranges of the district, which are rich in different types of vegetation. Only those types of species have been covered which are important from economic, industrial and medicinal point of view.

The vegetations are passing under a tremendous change due to burning, grazing, denudation, ruthless exploitation of forests, human invasion and industrialisation, etc.

Species observed two or three decades back have reached at the point of extinction and are surviving with a few scattered representatives. In villages, specially in rocky plains, *Yucca* had been dominating some years back but is now almost extinct.

The vegetation of the district has been studied by dividing the district in three zones—

- (i) Zones—covering forests.
- (ii) Zones—covering hills and rocky fields.
- (iii) Zones—plains (ditches, old disused coal mines, etc.).

Description of the characteristic trees.

Trees of commercial importance for their timber.

Sal—(*Shorea-robusta*).—It is the dominant species of the forests of this area. Tall and robust the tree offers a very good timber. The bark of the tree is used for fuel purposes. Besides forests the tree is commonly seen on both sides of the roads and on hills. There seems to be two forms of this tree the most prevalent having a dark-brown heart-wood while that of the other is white, slightly reddish.

Sisoo (*Shisham*) (*Dalbergia*).—A large tree, yielding good timber. The species are not common. They are mostly found on road side and on the hills.

Murga (*Pterocarpus*).—*Marsupium*—A large deciduous tree with a brownish heart-wood, used for making furniture. The plant is found only in jungles of Tundi, Topchanchi, etc.

Siris (*Albizzia-procera*).—This is one of the chief associates of the *sal* forests. The leaves are compound. Flowers are small in size. The wood is used for making wooden boxes.

Botsal (D-latifolia).—Deciduous trees yielding good timber. But the tree is not so common.

(Pongamia glabra).—Only one type of this species is found in wild state. It yields a low quality of wood. The seeds yield oil, used as medicine by the villagers.

Palas—(Butea-frondosa).—The plant is found in the form of medium size trees, and fairly common in the district. The hilly area, forests and plains are over populated by this plant. The standard of its size and its population are retrogressing rapidly due to human habitation and invasion. The characteristic feature of this plant is its brilliant orange, red flowers. In the summer months the *palas* trees offer a blaze of red flowers. The wood is utilised mainly for fuel purposes.

Mahua (Bassia-latifolia).—The plant is found in gigantic form and size. It has a very hardwood with reddish touch. The timber is used for many purposes. The plant is one of the common associates of the forests and universally occurring in hills and plains. It is seen that in village area this is the only type of tree which is not being ruthlessly spoiled due to its ample economic importance.

The flowers are an important source of food. The *mahua* flower is cooked and eaten by the poorer classes. The *mahua* in dry state is one of the fodders for animals. The fruit yields an oil which is used for culinary purposes, for lamps and in adulterating ghee. A decoction of *mahua* gives an intoxicating drink commonly taken by the *adibasis* and others.

Kend (Diospyros-melanoxylon).—It is a small or medium sized tree common in hilly area. The fruit is palatable in ripe state.

Gamhar (Gomelina-arborea).—The timber is used in making furniture. It is fairly common in Govindpur area.

Plants yielding edible fruits, dyes, fibre, etc.

Malvaceae.—The family is important as consisting of a number of fibre-yielding plants.

Bombax-Malabaricum (Shimal).—It has a gigantic size. The flowers are showy and red in colour. The seed yields fine silk cotton which is marketed by the name of Kopok fibre. *Kydia Calycina* is a large shrub, from the bark of which fibre is obtained. Other wild *Malvaceae* which yield fibre are mostly shrubs, but they are not common.

Certain plants of the family *Sterculiaceae* are fibre yielding, as *S. foetida*. The plant is not common in wild state, but a few of them are seen planted on road side.

Fibre is also obtained from *Crotolaria (San)* which is never found in wild state.

Plants yielding dyes.

Natural dye stuff and stains, obtained from the roots, bark, leaves and flowers have been obtained from the earliest times. They played earlier an important part in the social life of the people.

The plants of such value are very few and always in scattered condition, except those of *palas* which are one of the dominating representative in forests, plains, hills and even in road side.

The flowers of *Butea-frondosa* (*palas*) are used in extracting dyes, specially in spring season, when the tree appears deep red due to its red flowers.

Lawsonia-alba (*Mihendi*).—A shrub never found in a wild state and makes a good hedge. The leaves yield "hena" dye which is used to colour the skin and hair. Commonly used to stain finger nails.

Woodfordia-floribunda (*Dhathi*).—Rarely seen in some part of Topchanchi forests. It has long arching branches which shed off reddish brown bark in fibres. The leaves and flowers are extensively employed in tanning and dyeing.

Morinda-tinctoria (*chaili*) is a moderate sized deciduous tree, seldom if ever found in a purely wild state. This at one time was a most important tree as the bark of the root was extensively used to dye yellow and red. Other species are a few species of *Oldenlandia*.

Curcuma longa (*turmeric*) cultivated as one of the important colouring material of India. The natural dye is orange red.

Oroxylum indicum (*Sonae*).—A small tree remarkable for its long flat, sword like capsule and large flowers. The bark and fruit are used in tanning and dyeing. Certain red wood dyes are also produced from the heart-wood of *caesa pinia*.

Mango—(*Mangifera indica*).—The tree which is in wild state, yields rather inferior quality of fruits—dwarf in size. Those which are cultivated yield superior quality of fruits. It is largely planted as groves near villages and on road sides.

Pial—(*Buchanania latifolia*).—It is a middle sized tree, generally found in wild state. The fruits, on ripening, are edible.

Bhelwa—(*Semecarpus anacardium*).—The plant is found only in wild state. It is one of the common associates of the forests of this area. Its fruit is generally one inch in length, the pericarp is full of an acrid juice, which takes the place of marking ink, the hypocarp when ripe is of a bright orange colour and is edible.

Sajina (*Moringa-pterigosperma*).—Generally cultivated for its great food value. The tree is medium size. Stem is soft and tender. Leaves, flowers and fruits are eaten. Leaves boiled and taken are supposed to control hyper-tension.

Imli (*Tamarindus-indica*).—Found both in cultivated and wild state. The tree is of gigantic height and grows on the plains and

hills. The fruits are legume and edible, both in ripe and unripe condition. The seeds yield starch and are eaten in periods of scarcity.

Amaltas (*Cassia-fistula*).—Mostly trees or shrubs, flowers, in large pendulous racemee of a bright yellow appearance. Fruits cylindrical.

Jamun (*Eugenia-jambolanda*).—Occurs both in wild and cultivated state. The plants occurring in forests, yield low quality of fruits, but those which are cultivated yield superior quality food. Commonly seen on both the sides of roads. The pulp of the seed is said to have effect on diabetes. The juice of the fruits is digestive.

Kadam (*Anthocephalus cadamba*).—A large deciduous tree of rapid growth. The fruit is eaten and the flowers are offered in worship. The plants are exclusively in wild state and generally in the forests.

Kend (*Diosphyros-melanoxydon*).—The fruit when ripe is very palatable. It is a common food of the Santhals.

Kathal (*Artocarpus integrifolia*).—It is a large ever-green tree and extensively planted for its fruit which is of high value. The fruit comes out generally after spring. It supplements the food and becomes the only source of food for the poorer classes if in distress.

Dumbar (*Ficus-curia*).—Usually in wild state and prized for the fruits which are edible.

Dahua (*A lakoocha*).—Only in wild state, commonly found in hill and forests. Fruits when ripe, become yellow and edible.

Aura (*Phyllanthus-emblica*).—A small tree. Generally in wild state but a few of them are also seen in the villages. The fruits are edible and also pickled.

Medicinal plants.

The pharmacology of the plants has not been studied but their use for medicinal purposes is quite common.

The pulp of the fruits of *Amaltas* is used as purgative.

The bark of the *Ashok-tree* (*family leguminosae*) is used for treating the wounds of animals. The flowers of *Makehan* (*pterispermum-acerifolium*) are used as a disinfectant.

Rohan (*Soyimida-Febri-fuga*, *family Meliaceae*)—the heart-wood of the tree is brown. The powder of the heart-wood and some time leaves are boiled and applied for the treatment of pain of the bone and muscle-strain.

The medicinal plants are mostly herbs and shrubs which occur
Ipomaea-aquatica—a twining herb, common in ponds and in exclusively wild state.

ditches. Flowers pale rose-coloured, funnel-shaped, medicinal, dried juice used as a purgative.

Ipomoea purga.—The tubercles are used as a purgative.

Datura alba (*Dhatura*, family, *Solanaceae*).—Poisonous herb, strong smelling common in gardens and waste ground. The seeds are poisonous which yield a drug called stramonium.

Nicotianatabacum (Tobacco).—Generally cultivated. The alkaloid nicotine has medicinal and insecticidal properties.

Withania somnifera (Asgand).—A well branched herb, common in waste ground. The various parts of the plants are used for medicinal purposes.

Adhatoda Vasica (Basaka)—family *Aanthaceae*.—Wild in sub-mountainous regions. Leaves, barks, etc., are used for various medicinal purposes.

Salvia—Wild herb, has some medicinal properties. Generally the plants of family labiatoe are cultivated for their medicinal value.

Pedlium (*Mota gokhru*—family *Pedalia ceae*) wild. The decoction of pedalium fruits is used for urinary complaints, spermatorrhoea and impotency. The infusion of leaves and stem are also used for venereal diseases. The juice of fruit is also medicinal and prescribed in purporeal diseases, etc.

Castor (*Ricinus*).—Castor oil is extracted from the seeds of *R. Communic* and used as lubricant and purgative. Apart from *Ricinus* there are certain wild herbs and shrubs of the family *Euphorbiaceae* which are deadly poisonous.

Besides there are other medicinal plants like *Rowalfia serpentina* (*Sarpagandha*) *aconite*, *Aloe*, etc. *Sarpagandha* is now being cultivated by the Forest Department in Santhal Parganas and may be encouraged in this district.

Apart from the above described plants of economical value, there are a lot of herbs and shrubs which are of no economic importance.

Palmoe—*Borassus-flabelli formis* (*Tal*), *Phoenix sylvestris* (*khajur*).—Both occur in wild state. The former seems to flourish every where, while the latter grow mostly in wild state. Fruits are edible. *Aloe* (*Ghikawar*) wild, generally on hills and rocks. The plant is used medicinally for piles and fissures. Fresh juice is supposed to be cooling useful in fever. Dried juice is used in constipation. The pulp is given for ladies, ailments like menstrual irregularity.

Gramineae (*Grass-family*).—The dominative member of this family is bamboo, which is one of the common associates of forests of this district. Bamboo clumps are found in villages.

Of the fodder grasses the best known are the *Cynoden dactylon* (*Dub-grass*) grown in lawn, *Panicum colonum* (*Sawank*) used as

fodder, a species of *Arstida* (*Bhalki*, *Khar*), commonly used for making into brooms for household use. Some species of *Andropogen* are common in wild state. These are members of *Andropogen*, *Pollinia*, *Apluda*, *Chloris*, *Aristida*, etc.

The vegetational trends in soils containing coal in Dhanbad district.

In the used up coal mines, ditches and in rocky plains mainly two groups of communities are dominating. Firstly, the communities of *Lantana* (*Putush*) and secondly, *Papaver* (*Regni*). The *Lantana* attains some height in rainy season and have attractive pink, white or reddish flowers. It forms a thick shrub forest and becomes the best competitor. Gradually, it starts reducing its growth and in summer becomes smaller in size and thin in population. *Papaver* community is never seen associated with the community of *Lantana*. It seems that the presence of this community is due to the maximum percentage of alkali (42 per cent) in the soil of this district.

Certain parasites and epiphytes, like *lorenthees* and orchids are quite common. Orchid culture has not been tried in the gardens.

The carnivorous plant '*Drosera*' which is rare in Chotanagpur area is also found. The plant itself is brown in colour with sticky hair on its body. The plants occur in rocks and only in winter season remaining up to spring. It was observed that it starts disappearing just after the spring and again occurs on the same rock in the beginning of winter. The plant's food is insects.

FORESTS.

Dhanbad Forest Division comprises of all the forest areas situated in Dhanbad district. The forests of this district are mostly confined to the north bordering the forests of mainly Hazaribagh district and part of Santhal Parganas district. The forests lying in the south and east of the district are only remains and nothing else. The total forest area of this division is 106 square miles.

This division is an off-shoot of the old Manbhum Forest Division prior to the transfer of Purulia Sadar to Bengal. Consequent upon the transfer of territory this division was created synchronising with the creation of the Dhanbad district from 1st November 1956.

The forests mostly belonged to Private Forest Act; these forests used to be exploited by the owners for only monetary gain and the neighbouring villagers cut and removed fuel and timber without much hinderance. The result has been that all the forests are riddled with high stumps and pollarded shoots which will not develop into any quantities of trees unless a colossal amount is spent to cut them down to reasonable height from ground level. Repeated cuttings have caused the disappearance of forests in many areas.

In the past there used to be shifting cultivation particularly in the remoter regions and this practice is also to a great extent responsible for the disappearance of the forests in many areas. The forests situated on the hills present a formidable problem regarding protection of the forests thereon.

Hunger and unemployment urge hordes of people towards the hill and the helpless remains of the forests have to bear a great onslaught till the forests were almost denuded.

A vast majority of the forests are burdened with rights. The villagers have the right to take free of charges all the forest produce which they may require for their own *bona fide* consumption and not for sale or barter or transfer of any kind either temporary or permanent. They have also the right to graze cattle free of charge in the forest. Forests of Tundi Pahar is completely free from right but in the other Reserved Forest areas only Santhal residents have been allowed some rights. There is no restriction for taking minor forest produce like fruits, leaves, edible roots, etc. In Topchanchi the forests of Jharia Water Board are the most important. They cover the eastern extension of Parasnath hill and are all situated in the catchment area of the Jharia Water Board. The crop is almost formed of miscellaneous species such as *Asan*, *Paisal*, *Gumhar*, *Sidha*, *Dhaura*, etc. *Simal* is found mostly in lower slopes. *Sal* is practically non-existent but it occurs locally in a few forests bordering the forests of Giridih. Bamboo is one of the main species, extensive bamboos occur in almost all the forests of this catchment area. The lower parts are completely denuded of tree growth and lantanas abound. The Tundi Pahar and the forests towards the east and north-east form another compact block of forests. *Sal* is limited to the bottom fringes on the northern side of Tundi hills. The rest of the area contains miscellaneous species like *Asan*, *Mahua*, *Gumhar*, *Sidha*, *Bahera*, *Galgal*, *Doka*, etc. Forests are good where the impact of demand is less but in other areas the condition is deplorable.

Since the abolition of zamindari the forests are being given proper protection. Afforestation has also been taken up. There are some forest roads with a mileage of sixty-two. There are forest rest houses at Chas, Begnoria and Maniadih.

WILD LIFE—GAME SANCTUARIES, BIRDS.

No sanctuary exists in this division and little else is at present done than observing the wild life week and observing the prescribed close season. Measures to prevent poaching are inadequate. The Santals and other aborigines have an annual hunt which is a part of their social life which has not been restricted. Tigers, panthers, wild dogs, wild boars and very few antelopes are available but not commonly seen. There was indiscriminate slaughter of wild animals in the course of the World War II. The military used to go out in the nights with spot lights and butcher down hundreds of deer, etc.

The *Santals* who loom large in the forest areas, have been the greatest source of trouble. On occasions, hundreds of them armed with bows and arrows and sometimes with their dogs would visit the forests stealthily and destroy whatever animals they can surprise. In the process of this combing operation, even the smallest birds and rats are not spared.

Consequent upon the taking over of the forests under Government management shooting has completely been restricted. In fact very few shooting permits have been issued in the last five years and this was intended with the idea of restoring the incidence of the wild animals.

AVIFAUNA.

The following is a list of birds recorded from the district of Manbhum by S. R. Tickell (1833-36), Beavan (1860-62), V. Ball (1864-71) and E. H. N. Lowther (1930). The rapid industrialisation of the district has led to the denudation of the forests and growth of urban areas where avifauna cannot thrive. Moreover the old Purulia Sadar subdivision now transferred to Bengal has more of jungles, *jheels* and water-reservoirs. No scrutiny has been made in Dhanbad district proper but it is understood that many of the species are no longer found. This list is being given to show how avifauna has declined. There are, however, still peacocks, peafowls, partridges, wild fowls, lapwings, green-pigeons, snipes, etc., seen in the jungles.

Jungle Crow, House Crow, Treepie, Jungle Babbler, Common Babbler, Rufous-bellied Babbler, Yellow-eyed Babbler, Spotted Babbler, Common Iora, Gold-fronted chloropsis, Jerdon's Chloropsis, Red-Vented Bulbul, Red-whiskered Bulbul, Red-spotted Bluethroat, Brown-backed Robin, Dhayal, Shama, Orange-headed Ground Thrush, Tickell's Blue Flycatcher, Paradise Flycatcher, Madras Black-naped Flycatcher, White-browed Fantail Flycatcher, Spotted Fantail Flycatcher, Bay-backed Shrike, Black-headed Shrike, Wood Shrike, Small Manivet, Large Cuckoo-Shrike, Black Drongo, White-bellied Drongo, Tailor Bird, Streaked Fantail Warbler, Yellow-browed Willow Warbler, Ashy Wren-Warbler, Jungle Wren-Warbler, Indian Wren-Warbler, Golden Oriole, Black-headed Oriole, Rosy Pastor, Common Myna, Pied Myna, Baya, White-backed Munia, White-throated Munia, Spotted Munia, Red Munia, Yellow-throated Sparrow, House Sparrow, Wire-tailed Swallow, Cliff Swallow, Large Pied Wagtail, Rufous-winged Bushlark, Red-winged Bushlark, Ashy-crowned Finch-Lark, Whiteeye, Purple Sunbird, Purple rumped Sunbird, Tickell's Flowerpecker, Thick-billed Flowerpecker, Pitta, Mahratta Woodpecker, Golden-backed Woodpecker, Black-backed Woodpecker, Tickell's Crimson-backed Woodpecker, Green Barbet, Crimson-breasted Barbet, Indian Cuckoo, Pied Crested Cuckoo,

Koel, Large Green-billed Malkohax, Punjab Sirkeer, Crow-Pheasant, Large Parakeet, Rose-ringed Parakeet, Blossom-headed Parakeet, Nilkant, Ptringa, Blue-tailed Bee-eater, Blue-bearded Bee-eater, Pied Kingfisher, Common Kingfisher, Beaven's Kingfisher, Stork-billed Kingfisher, White-breasted Kingfisher, Large Pied Hornbill, Grey Hornbill, Hoopoe, House Swift, Batassia, Crested Swift, Long-tailed Nightjar, Jungle Nightjar, Franklin's Nightjar, Common Nightjar, Great Horned Owl, Collared Scope Owl, Spotted Owlet, Jungle Owlet, Pondicherry Vulture, Griffon Vulture, Long-billed Vulture, White-backed Vulture, Scavenger Vulture, Laggar Falcon, Small Spotted Eagle, Bonelli's Eagle, Brahminy Kite, Pariah Kite, Shikra, Sparrow Hawk, Green Pigeon, Orange-breasted Green Pigeon, Green Imperial Pigeon, Rufous Turtle Dove, Spotted Dove, Little Brown Dove, Ring Dove, Red Turtle Dove, Peafowl, Red Jungle Fowl, Painted Spur Fowl, Jungle Bush Quail, Blewitt's Bush Quail, Black Partridge, Grey Partridge, Bustard Quail, White-breasted Waterhen, Moorhen, Bronze-winged Jacana, Pheasant-tailed Jacana, Stone-Plover, Whiskered Tern, Little Ringed Plover, Red-wattled Lapwing, Yellow-wattled Lapwing, Little Cormorant, Black Ibis, White-necked Stork, Purple Heron, Grey Heron, Little Egret, Cattle Egret, Pond Heron, Night Heron, Chestnut Bittern, Pink-headed Duck, and Little Grebe.*

FISH.

Many of the tanks and irrigation bandhs are regularly stocked with fry of the *Rohu*, *Mirgal*, and *Katla* species and very small species are to be found in almost every patch of water. *Hilsa* and *Bachwa* are caught in the rivers during the rains. The lakes and bandhs are used for encouraging pisciculture. The details of fisheries will be found in the chapter on "Agriculture and Irrigation."

REPTILES.

Snakes are not specially numerous; of the poisonous varieties the cobra and the *karail* are fairly common. Of others most frequently seen is the *dhamna*. In the hilly areas an occasional python is met with and various species of harmless grass snakes are generally common.

*BIBLIOGRAPHY.

- Tickell, S. R.—List of birds collected in the jungles of Borabhum (Manbhum) and Dholbhum (Singhbhum), *Journal of the Asiatic Society of Bengal*, Vol. II, 1833, P. 569.
- Tickell, S. R.—Blyth's report on Tickell's collection—*Journal of the Asiatic Society of Bengal*, Vol. XI, 1882, p. 456.
- Capt. Beavan.—List of birds collected from Manbhum and other places, *Ibid.*, 1865, p. 400; 1867, p. 480; and 1868, pp. 78, 165 and 370.
- Ball, V.—*Avifauna of Chotanagpur, Stray Feathers*, 1874, Vol. II, p. 355.
- Lowther, E. H. N.—*A Bird Photographer In India*, Oxford University Press, London, 1949, p. 20.

The following yearwise figures show deaths due to snakes and wild animals*:-

Year.	Deaths due to snake-bites.	Killed by wild animals.
1957	10	Nil.
1958	6	Nil.
1959	2	Nil.
1960	7	3
1961	5	Nil.

THE CLIMATE OF DHANBAD DISTRICT.

The climate of this district is characterised by general dryness, except in the monsoon season and by a hot summer. The year may be divided into three main seasons. The cold season is from November to February and is followed by the summer season from March to May. The period June to September is the south-west monsoon season. October is a transitional month between monsoon and winter conditions.

Rainfall.

The district has a network of ten raingauge stations, records of which extend for periods ranging from 25 to 91 years. The average annual rainfall in the district is 1306.3 mm (51.43"). The details of the rainfall at these stations and for the district as a whole are given in Tables 1 and 2. The regions near the northern border of the district get comparatively higher rainfall than other parts of the district. During the south-west monsoon months June to September the district receives 82 per cent of the annual rainfall. July is the rainiest month. The variation in the rainfall from year to year is not large. In the fifty-year period 1901 to 1950 the highest annual rainfall amounting to 135 per cent of the normal occurred in 1917 while the lowest annual rainfall which was 74 per cent of the normal occurred in 1910. In the same fifty-year period there were only 3 years in which the rainfall in the district was less than 80 per cent of the normal, no two of them consecutive. But at a few stations such low rainfall in two consecutive years has occurred once in the fifty-year period. It will be seen from Table 2 that the rainfall was between 1,100 and 1,600 mm (43.31 and 62.99") in 42 years out of fifty.

On an average there are 70 rainy days (i.e., days with rainfall of 2.5 mm—10 cents—or more) in a year. This number varies from 61 at Bagmara to 82 at Rajdaha.

The heaviest rainfall in 24 hours recorded at any station in the district was 272.0 mm (10.71") at Dhanbad on 1913 August 8.

Temperature.

The only meteorological observatory in the district is at Dhanbad. Temperature and other data of this station may be taken

*SOURCE—Jharia Water Board of Health, Dhanbad.

as representative of the climatic conditions in the district as a whole. Temperatures begin to decrease progressively from November. January is the coldest month with the mean daily maximum temperature at about 24.5°C (76.1°F) and the mean daily minimum at 11.9°C (53.4°F). In association with cold waves which affect the district in the winter months, in the wake of western disturbances which move across north India, the minimum temperature may go down to about 5.0°C (41.0°F). After February the temperatures rise steadily till May which is the hottest month when the mean daily maximum temperature is 38.3°C (100.9°F) and the mean daily minimum is 25.6°C (78.1°F). In May and the early part of June before the onset of the south-west monsoon, maximum temperatures may reach 45°C (113°F) or above on some days. With the advance of the south-west monsoon into the district by about the second week of June the weather becomes appreciably cooler and continues to be so throughout the season. From October temperatures begin to decrease.

The highest maximum temperature recorded at Dhanbad was 46.1°C (115.0°F) on 1944 May 28 and 1942 June 10. The lowest minimum temperature was 5.0°C (41.0°F) on 1950 February 12.

Humidity.

Except in the south-west monsoon season when the relative humidities are high the air is generally dry. The summer months are the driest with low relative humidities especially in the afternoons.

Cloudiness.

In the winter and the early part of summer skies are generally clear or lightly clouded. The cloudiness increases in April and May, particularly in the afternoons. During the south-west monsoon season skies are heavily clouded or overcast.

Winds.

Winds are generally light to moderate with a slight increase in force in the summer and monsoon seasons. In May and the monsoon season winds are predominantly from the east or south-east. In October winds are variable in direction. In the winter season and the first half of summer winds are mainly from directions between west and north.

Special weather phenomena.

Depressions originating in the Bay of Bengal during the monsoon season affect the district and its neighbourhood during their movement in a westerly direction after crossing the coast and cause gusty winds and widespread heavy rain. Thunderstorms occur during the period March to October, those in the summer season being accompanied with squalls and hail, very occasionally. Dust raising winds are common in the summer season. Fogs sometimes occur in the winter months.

Tables 3, 4 and 5 give the temperature and humidity, mean wind speed and the frequency of special weather phenomena respectively for Dhanbad.

TABLE
Normals and

Station.	Number of years of data.	Jan.	Feb.	March.	April.	May.	June.	July.	Aug.
1	2	3	4	5	6	7	8	9	10
Gobindpur	50 (a)	13.5	28.7	21.6	20.3	57.9	192.8	328.9	317.3
	(b)	1.2	2.4	1.6	1.8	3.9	10.5	16.7	16.2
Chas ..	49 (a)	15.7	26.2	20.1	13.7	50.3	179.8	326.9	307.9
	(b)	1.4	2.1	1.4	1.3	3.2	9.0	15.4	15.2
Dhanbad .	41 (a)	14.0	26.9	18.8	16.5	48.5	192.0	333.5	338.3
	(b)	1.1	2.4	1.7	2.0	4.1	10.5	17.7	15.9
Topchanchi	37 (a)	20.1	29.2	18.8	19.3	56.4	211.6	398.0	350.8
	(b)	1.5	2.2	1.7	1.7	4.1	11.0	19.8	18.1
Tundi ..	36 (a)	20.6	32.0	16.5	20.3	50.1	218.4	380.7	356.6
	(b)	1.4	2.0	1.3	1.6	3.5	10.4	17.7	17.8
Rajdaha ..	35 (a)	21.1	26.4	16.3	15.7	56.6	217.2	407.2	356.4
	(b)	1.6	2.2	1.7	1.7	4.1	11.7	20.5	19.4
Pokhuria ..	31 (a)	12.9	26.7	15.7	20.3	48.0	198.6	313.7	292.3
	(b)	1.2	2.1	1.2	1.7	3.6	10.6	16.1	15.6
Baghmara .	15 (a)	6.3	16.0	25.7	15.5	37.9	162.6	287.5	279.7
	(b)	0.7	1.4	2.0	1.0	2.8	8.8	15.1	15.1
Katras ..	15 (a)	14.5	20.1	22.1	17.0	46.0	159.3	373.4	313.7
	(b)	1.2	1.7	1.6	1.9	3.1	8.0	10.3	15.3
Pandra .	43 (a)	12.5	27.7	21.1	17.8	54.9	204.2	288.8	288.5
	(b)	1.0	2.5	1.7	1.7	4.0	10.6	16.7	16.2
Dhanbad (District).	(a)	15.1	26.0	19.7	17.6	51.3	193.7	343.9	320.1
	(b)	1.2	2.1	1.6	1.6	3.6	10.1	17.2	16.5

(a) Normal rainfall in mm. (b) Average number of

*Based on all available
†Years given

I.

Extremes of Rainfall.

Sept.	Oct.	Nov.	Dec.	Annual.	Highest annual rainfall as per cent of normal and year†.	Lowest annual rainfall as per cent of normal and year†.	Heaviest rainfall in 24 hours*.	
							Amount (mm.)	Date.
11	12	13	14	15	16	17	18	19
209.5	94.0	10.4	3.3	1298.2	151 (1917)	70 (1912)	248.9	1913 Aug. 7.
10.7	4.0	0.7	0.4	70.1				
207.5	78.7	11.4	3.1	1241.3	140 (1924)	68 (1934)	231.9	1935 Aug. 12.
9.5	3.5	0.7	0.3	63.0				
213.4	90.4	12.9	3.8	1309.0	134 (1922)	74 (1925)	272.0	1913 Aug. 8.
10.7	4.0	0.7	0.3	71.7				
228.6	103.9	12.9	0.8	1454.4	126 (1917)	54 (1938)	228.6	1958 Sept. 29.
11.7	5.0	0.9	0.4	78.1				
241.5	107.2	14.0	5.1	1469.0	143 (1937)	69 (1921)	170.2	1949 June 12.
10.8	3.9	0.8	0.4	71.6				
236.5	104.7	14.0	5.6	1477.7	124 (1929)	62 (1930)	214.6	1958 Sept. 16.
12.9	5.0	1.1	0.5	82.4				
206.8	78.5	11.2	3.8	1228.5	141 (1922)	75 (1932)	153.7	1913 Aug. 7.
10.6	4.3	0.7	0.4	60.5				
184.7	100.3	0.1	0.1	1128.4	125 (1941)	54 (1947)	139.2	1941 Oct. 9.
9.3	4.0	0.7	0.5	61.4				
196.9	88.4	5.3	2.8	1259.5	134 (1942)	75 (1945)	254.0	1943 July 16.
10.9	3.8	0.5	0.3	64.6				
181.1	85.6	11.2	2.8	1196.2	145 (1917)	73 (1915)	268.5	1902 Sept. 5.
10.4	4.0	0.7	0.4	69.9				
210.7	93.2	10.9	4.1	1306.3	135 (1917)	74 (1910)	..	..
10.8	4.2	0.7	0.4	70.0				

rainy days (days with rain of 2.5 mm. or more).

data up to 1958.

in brackets.

TABLE 2.

Frequency of Annual Rainfall in the District.

(Data 1901- 50).

Range in mm.	Number of years.	Range in mm.	Number of years.
901—1000	2	1401- 1500	8
1001—1100	3	1501 - 1600	4
1101—1200	11	1601-- 1700	2
1201—1300	9	1701— 1800	1
1301—1400	10	..	..

TABLE 3.
Normals of Temperature and Relative Humidity.
 (Dhanbad.)

Month.	Mean Daily Maximum Temperature.		Mean Daily Minimum Temperature.		Highest Maximum ever recorded.		Lowest Minimum ever recorded.		Relative Humidity 0830.*				
	oC	2	oC	3	oC	4	Date	5		Date	7	8	Percent
1													
January	24.5	..	11.9	..	32.2	1950 Jan. 22	..	7.2	1955 Jan. 7	..	60	
February	26.7	..	14.1	..	38.3	1950 Feb. 21	..	5.0	1950 Feb. 12	..	56	
March	33.0	..	18.9	..	40.6	1955 Mar. 22	..	11.7	1945 Mar. 8	..	40	
April	37.2	..	23.2	..	43.9	1954 Apr. 19	..	13.3	1945 Apr. 22	..	42	
May	38.3	..	25.6	..	46.1	1944 May 28	..	18.3	1949 May 7	..	59	
June	35.4	..	25.9	..	46.1	1942 June 10	..	18.3	1943 June 4	..	71	
July	31.0	..	24.9	..	36.7	1958 July 8	..	21.7	1951 July 26	..	84	
August	30.6	..	24.6	..	36.1	1951 Aug. 2	..	21.7	1953 Aug. 27	..	85	
September	31.1	..	24.2	..	35.1	1958 Sept. 4	..	20.6	1950 Sept. 27	..	83	
October	30.4	..	20.9	..	35.6	1951 Oct. 19	..	14.4	1954 Oct. 30	..	72	
November	27.7	..	15.4	..	32.8	1950 Nov. 3	..	9.4	1952 Nov. 30	..	58	
December	24.8	..	12.2	..	30.6	1950 Dec. 21	..	7.2	1955 Dec. 26	..	57	
Annual	30.9	..	20.1	..	..	..	..	..	..	..	64	
*Hours I. S. T.													

*Hours I. S. T.

TABLE 4.

Mean Wind Speed in Km./hr.

(Dhanbad.)

Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	An- nual.
1	2	3	4	5	6	7	8	9	10	11	12	13
6.9	8.2	9.5	10.1	9.8	9.7	9.5	8.9	7.6	6.4	6.9	7.1	8.4

TABLE 5.

Special Weather Phenomena

(Dhanbad)

Mean no. of days with	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	An- nual.
1	2	3	4	5	6	7	8	9	10	11	12	13	14
Thunder	0.6	1.1	2.6	3.7	6.1	12.1	11.5	12.0	12.3	4.2	0.2	0.8	67.4
Hail	0.0	0.0	0.1	0.4	0.1	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.7
Dust-storm	0.0	0.3	0.3	1.1	1.1	0.7	0.1	0.0	0.0	0.0	0.0	0.0	3.6
Squall	0.0	0.0	0.0	0.1	0.3	0.0	0.0	0.0	0.1	0.0	0.0	0.0	0.5
Fog	2.4	0.5	3.4	0.7	0.1	0.0	0.1	0.4	0.3	1.0	1.1	4.7	14.7

CHAPTER II.

HISTORY.

The history of Manbhum district a portion of which was at first Dhanbad subdivision and then upgraded as sub-district and ultimately separated as a district with certain additions has been outlined by Mr. Coupland in Chapter II of the *District Gazetteer of Manbhum*. Mr. Coupland's account was scrutinised by Mr. B. K. Gokhale, I.C.S., Settlement Officer of Chotanagpur who mentions in his *Final Report of the Survey and Settlement Operations in the district of Manbhum* (1918-1925) published in 1928 that "Mr. Coupland's account is based on all the old records available and on the testimony furnished by archaeological ruins. The traditional family histories handed down in the families of the principal proprietors have been given at length in Chapter XV of the Gazetteer; but as pointed out by Mr. Coupland, very little of scientific value can be gathered from these traditions; which are coloured by the attempts of the proprietors to manufacture for themselves a Rajput origin. Since the writing of the Gazetteer, the traditional histories have acquired more colour merely by the passage of time and force of repetition while the value of the archaeological evidence has been further diminished by the washing away of several of the old ruins, by floods as at Telkupi, and gradual deterioration of others owing to the action of the wind, rain and sun."

It was rather unfortunate that the Deputy Commissioner's record-room at Purulia was burnt during the Mutiny and no ancient documents were available in the Deputy Commissioner's office at Purulia when Mr. Gokhale wrote his report. Mr. Gokhale mentions "The old documents in the Commissioner's office as well as in the offices of the Board of Revenue, Bengal, which were examined did not yield any fresh material with which to supplement the history as written by Mr. Coupland or to set up any alternative theory of developments in the district. In course of survey and settlement no rock inscriptions, copper-plates or old coins were discovered, though practically every corner of the district was covered by the Assistant Settlement Officers. Not a single document on copper-plate or palm leaf was found which could throw any light on the past. The oldest authentic documents produced were all on paper and barely even a hundred years old."

A brief summary of Mr. Coupland's account and his more important conclusions appear in the *Final Report of the Survey and Settlement Operations* and it is best to quote *in extenso* some of the paragraphs of this report although much of it now refers to the district of Purulia in West Bengal which was made over to West Bengal as an implementation of the recommendation of States Reorganisation Commission in 1956.

The chapter on History in the *Final Report of the Survey and Settlement Operations in the district of Manbhum* (1918-1925) published in 1928 mentions—

“Early History.—Hardly anything is known of the early history of the district with any degree of certainty. It cannot be definitely said how the name “Manbhum” originated. There can be, however, little doubt that Mundari or Kolarian races occupied the wild area south of Bihar in Pliny’s time. Buchanan suggests that the Mundari races are descended from that portion of the original population of Magadha, the ancient name for Bihar, which migrated south towards the great forest country of Chotanagpur, under pressure from the Aryan immigrants.

“In the seventh century A. D. some definite information is available about this part of the world from the account of the travels of Hieun Tsang. These accounts speak of a powerful kingdom ruled by She-Shang-Kia or Sasanka, who was famed as a great persecutor of Buddhists. His kingdom comprised all the petty hill states lying between Midnapore on the east and Sirguja on the west. The capital of this kingdom is variously placed by General Cunningham at or near Barabazar in *pargana* Barahabhum, by Commissioner Mr. Hewett at Lalmi in *pargana* Patkum where extensive ruins still exist and by Mr. Beglar at or near Safaran, some ten miles north-west of Dalmi on the banks of the Subarnarekha.

“Combining the theories of Colonel Dalton and Mr. Beglar, who are the two most important authorities on the subject, it would appear that the earliest civilization in the district was that of the Jains. The descendants of the Jains, the Saraks, still exist in considerable numbers in the eastern part of the Sadar subdivision. Their ancestors are credited with having built the temples at Para, Charra, Baram and other places. Colonel Dalton places them in the districts as far back as 500 or 600 B.C. and ascribes to them the ancient ruins at Dalmi, Telkupi, Pakbira and other places. According to Mr. Beglar the whole country was not extensively cultivated or populated like the plains of Magadha but there existed very important trade routes passing through the district and going from Tamluk (Tamralipta) to Patna (Pataliputra), Gaya, Rajgir and Banaras. The route from Tamluk to Patna probably passed through Raghunathpur, Telkupi and Jharia which would explain the extensive ruins at Telkupi

on the banks of the Damodar. Another route from Tamluk direct to Banaras probably passed through Pakbira and Budhpur on the banks of the Kasai near Manbazar, and through Barabazar to Dalmi on the Subarnarekha; passing westwards further on through Ranchi and Palamau to Banaras. The ruins at Boram, Balarampur, Chharra, Para and Katras would then be explained by the existence of cross roads joining up these two main routes to Patna and Banaras. The fact that in these ancient times the merchants who are credited with having built these old temples, thought it worthwhile to spend such enormous sums of money at each of the big centres at each of the important river crossings, proves that the country was well governed and the roads kept free from dacoits and *chuars*, who in comparatively recent times gave Barahabhum such an unenviable reputation. I also find it difficult to believe that at that time, Barahabhum was so full of *jungle*, as it was, even at the time of Revenue Survey.

"Sometime before the seventh century A.D. the Jain civilisation appears to have been superseded by Brahmins and their followers. The tenth century, judging by the evidence of such of the buildings as it is possible to date with any accuracy, saw the Brahmanical civilisation at its prime. To this period is attributed the superimposition of the Brahmanical element on the old temples at Dalma, Telkupi, Pakbira and other places. There does not appear to have been any fighting between the Brahmins and the Jains and probably the Brahmins gained supremacy by peaceful penetration and sheer force of intellect.

"The history of the Kolarian races in more recent times gives more than one illustration of their capacity for living for years in apparent peace with their neighbours and then suddenly rising and overwhelming them. Something of this sort must have happened sometime after the tenth century when the Bhumij, possibly assisted by fresh migrations from the west, rose and destroyed the Brahmanical civilization, root and branch. For the next five centuries history as such is non-existent. Under Bhumij *swaraj*, the trade routes were all stopped and the country was not even comparatively safe for the ordinary traveller. The old Hindu temples were either destroyed or what is more probable gradually became dilapidated through lapse of time and want of repairs.

"The migration of the Saraks from *pargana* Manbhum northwards to Panchet, which is said to be due to an outrage committed by Man Raja on a girl belonging to their caste probably dates sometime about the beginning of the Bhumij *swaraj* which chiefly extended over the southern half of the district, south of the river Kasai.

"*The Muhammadan Period.*—So far as this area is concerned, there is no trace, even in tradition, of any Muhammadan invasion. To the Muhammadan historian, the whole of Chotanagpur was known as Jharkhand, being a disturbed frontier country, the barbarous inhabitants of which required special military precautions to keep them in check. In the *Bhabishyat Puran*, compiled in the 15th or 16th century, the country is described as overspread with impenetrable forests of *sal* and other trees and containing mines of copper, iron and tin. The men are described as savage and irreligious, eating snakes and all sorts of flesh and living chiefly by plunder or hunting. The women are described as being in garb, manners and appearance more like *rakhasis* than human beings.

"In 1589 or 1590 during the reign of Akbar, Raja Man Singh marched his troops from Bhagalpur through the western hills to Bundwan *en route* to reconquer Orissa; and again a couple of years later he sent his troops through Jharkhand to Midnapur. On both these occasions he must have passed through portions of this district. The repairs to the old temples at Para and Telkupi which are traditionally ascribed to Raja Man Singh must have been thus effected at the end of the sixteenth century to which period also is ascribed the building of the Panchet fort. In spite of Raja Man Singh's visits to Manbhum, however, so little was known about the country that in 1659 Prince Mohammad, son of Aurangzeb and Mir Jumla had some difficulty in getting information about the alternative route from Patna to Bengal passing through Jharkhand.

"*Panchet Estate.*—In 1632 or 1633 we get the first specific reference to Panchet in the *Padi-Shah-Nama* where Bir Narain, zamindar of Panchet, is described as a commander of 300 horses. In 1658 for the first time Panchet is shown as liable to a *Peshkush* or fixed tribute. In later records, references to Panchet are more numerous. The *peshkush* was gradually increased, implying a greater degree of control from Murshidabad and it is possible that the abandonment

of the Panchet fort about 1700 A.D. was a mere withdrawal of the zamindar to a less easily accessible portion of his zamindari to avoid pressure from the Nawab. The increase in the *Peshkush* was affected in the following manner as related by Sheristadar Mr. J. Grant.

"From the year 1135 to 1150 of the Bengal era (1728-43 A.D.) Raja Garur Narayan was subject to an annual tribute of Rs. 18,203 for the fiscal division of Panchet and the Kismat of Shergarh. In 1743 an additional charge of Rs. 3,323 was levied from the estate in the form of the *abwab, chaut marhatta* imposed by Ali Vardi Khan. In 1170 (1763) the *sarf-i-sikka* or import imposed by Kasim Ali to cover losses on the exchange of coins, swelled the net assessment to Rs. 23,544. Muhammad Reza Khan in 1766 raised the demand to Rs. 30,000, but only Rs. 5,969 was in fact collected during that year. In 1771 a *zor talab* or compulsory exaction of Rs. 1,41,954 including a *saranjami* or deduction for collection charges of Rs. 17,302 was established, and the demand enforced by military authority.

"During the Muhammadan period, it appears that Barahabhum and Manbhum were separate principalities constantly at war with Panchet but there is no mention of any of the other estates in the district or their relationship with Panchet. There is no evidence to show that any of these estates, except perhaps Pandra, paid any regular revenue to the Muhammadan rulers. The Muhammadan connection with Manbhum was thus of the very slightest.

"*Early British Administration.*—The territory comprised in the district of Manbhum was acquired by the British with the grant of the Dewani of Bengal, Bihar, and Orissa in 1765. Even as late as this, however, our knowledge of the district hardly extends beyond Panchet.* A few years later Jhalda is described as a recent annexation of Panchet. The zamindari of Barahabhum and Manbhum were still independent kingdoms nominally attached to Midnapore, while Patkum and Baghmundi were included in Rangach, as also probably all the estates north of the Damodar, with the possible exception of Pandra.

"The history of the district during the earlier years of British rule seems to have consisted of a series of small military

*This Panchet or Panchkote is now in Putulia district (West Bengal) and must not be misunderstood for Panchet Dam area which is in Dhaubad district (P. C. R. C.).

expeditions intended to bring the *chuars* and minor zamindars under control. The storm centre was at Barahabhum in the country of the Bhumij with the Raja of Manbazar or Manbhum and the robber chiefs of Koilapal occasionally taking part with the *chuars*. In 1767 Lieutenant Fergusson led an expedition against Manbhum and Barahabhum along with Dhalbhum as a result of which the Manbhum and Barahabhum Rajas eventually agreed to pay Rs. 316-2-0 and Rs. 441-5-9 as revenue or tribute. In spite of this there was a succession of outbreaks up to 1773 when finally a detachment of sepoy was permanently stationed at Barahabhum to prevent a recurrence of these outbreaks.

"The history of the rest of the district seems to have followed a more peaceful but less interesting course. In 1782, the military road which is known as the "Old Benares Road" was constructed cutting right through the zamindari of Panchet. In 1782-83 Major Crawford quelled disturbances in Jhalda, Nawagarh and Jharia which by this time appear to have become subordinate to Panchet and the zamindars of which had started committing depredations and withholding rents. Disturbances continued at intervals in various parts of the district and it was not until 1796 when the Permanent Settlement of the area was finally effected that the whole district may be said to have come effectively under British control. Probably sometime before this the people in the area were disarmed on the recommendation of Major Crawford

"As we saw in paragraph above in 1771 a *zor-talab* or compulsory exaction of Rs. 1,44,954 including a *saranjami* or deduction of Rs. 17,302 was established in the case of Panchet and the demand enforced by military authority. The subsequent revenue history of Panchet may be quoted from the Gazetteer. "In the 'gross medium settlement' of 1777 with Raja Raghunath Narayan 'the actual payment of Panchet, with the recent territorial annexation of Jhalda,' is stated at Rs. 69,027. Yet the amins had discovered sources of revenue amounting in all to Rs. 1,54,423 including *palatika* or revenue chargeable on lands that had been deserted by cultivators. Finally, in 1783, the total assessment of same territory amounted to Rs. 76,532, charged with a deduction of about Rs. 57,000 for collection expenses. This, Mr. Grant points out, gives little more to the sovereign than the original tribute,

and 'leaves a recoverable defalcation exceeding one lakh of rupees, if we take the *zor-talab* or compulsory exaction of 1771 as the proper standard.

"The early days of British rule were marked by a constant struggle between the authorities and the zamindar who was persistent in neglecting to pay the revenue demanded, and from time to time portions of the estate were made over, generally unsuccessfully, to farmers. Eventually the Decennial Settlement was concluded in 1791 with the proprietor, and 18 months later, in March 1793, was made permanent and the revenue fixed at Rs. 55,794, this amount being arrived at by detailed assessment of every village within the zamindari, with the exception of the numerous rent-free grants, of which a list had been furnished by the zamindar as early as 1771. According to this list and the later one of rent-paying villages returned at the time of the Decennial Settlement, the whole estate consisted of 1,280 villages, of which 404 only were *mal* of rent-paying, and 49 *khas khamar* or retained in the zamindar's hands. The zamindar included 388 *brahmotars*, 68 *debotars*, 2 *bhatotars*, 2 *mahatrans* and 180 *Jagirs* held on quit rents and variously described as *moghuli*, *talabi* or *panchaki*, 57½ villages were set aside as Digwari and over 200 villages were entirely rent-free; these latter form respectively the Digwari and revenue-free properties now borne on the district roll. The extent of these deductions from the area of the estate capable of paying a full rental no doubt accounts very largely for the low incidence of the revenue fixed, which works out at almost exactly half-an-anna to the acre on the total area of the estate. The revenue then assessed was made permanent in 1793 the estate being, however, at the same time made liable to a contribution of Rs. 1,754 per annum towards the upkeep of the police, a demand which continues to the present day."

After mentioning the introduction of the Permanent Settlement the Settlement Report mentions—

"*Sale of Panchet in 1795.*—In 1795 the Panchet estate was put up to sale for arrears of revenue and purchased by one Nilambar Mitra. The zamindar complained that the default and consequent sale was due to collusion between his Dewan and the Collectorate staff and prayed for the cancellation of the sale. But the authorities paid no attention. The zamindar then refused to allow the auction purchaser any footing in the estate and he was loyally supported by his tenantry.

Various attempts on the part of the Collector to form portions of the estate or to manage them *khias* were all defeated. By 1798 the whole of the estate was in a state of insurrection. The difficulties of the authorities were further increased by a fresh outbreak of the *chuars* in the south of the district and finally there was a complete climb down on the part of Government. The sale was set aside and the estate restored to the zamindar. It was probably this victory which emboldened his successor to adopt a defiant attitude towards Government during the Mutiny of 1857.

"The troubles in Panchet led to the transfer of the administration of this area from the Collector of Ramgarh to the Collector of Birbhum with a view to closer supervision. The Baghmundi zamindar was also indirectly benefited by having his estate restored to him though it had been confiscated a year or two before for participation in the *chuar* outbreaks. The case of Panchet seems to have forced on the notice of Government the desirability of supporting hereditary chiefs in their zamindari in view of the strong objection of the local aborigine to the rule of any but his hereditary chief. It was this fact which subsequently led to the introduction in this district of the Chota Nagpur Encumbered Estates Act VI of 1875.

"*Regulation XVIII of 1805.*—By Regulation XVIII of 1805, the Jungle Mahals District was constituted into a separate magisterial charge with headquarters at Bankura. This Regulation made provision for a police system under which, except in Panchet, the zamindars themselves were made the police *darogas* and they provided and were responsible for the subordinate police. In Panchet where the area was too big for the zamindar to exercise personal supervision, the system was supplemented by a *thana* system of which the zamindar provided the cost. The next 25 years that followed were uneventful and saw the area brought under closer control. So far as the revenue administration was concerned things seem to have settled down to a certain extent though the Panchet zamindar taking advantage of his successful opposition in 1798 was almost constantly in arrears. On the whole, however, the period from 1805–1832 was one of peace and orderly progress.

"*Ganga Nurain's Rebellion.*—Following immediately after the Kol rising in Singhbhum, Ranchi and Palamau, very serious disturbances broke out in 1832, arising out of

a disputed succession in Barahabhum. The disturbances were confined more or less to the three southern *parganas*, Barahabhum, Manbhum and Koilapal and did not seriously affect the area included within the present operations. A full account of the outbreak together with a summary of its causes and results appears in the Gazetteer. The disturbances finally came to an end in 1833 with the death of Ganga Narain, after which peace and order were again quickly restored.

"The state of things disclosed by Ganga Narain's outbreak showed that Manbhum in common with Chota Nagpur proper was not yet fit to be a regulation district. Hence Regulation XIII of 1833 was passed by which the district of the Jungle Mahals was broken up. The estates of Senpahari, Shergarh and Bishnupur were transferred to Burdwan and a new district called Manbhum with its headquarters at Manbazar constituted. This district included besides its present area the estates of Supur, Raipur, Ambikanagar, Simlapal, Bhelaidiha, Phulkusma, Shamsundarpur and Dhalbhum. In 1838 the district headquarters were removed to Purulia which was a more central and convenient place though then described as lying in the centre of the jungles. Prior to the Mutiny, the only further changes were the transfer of Dhalbhum to Singhbhum and the change in title of the chief officers, the Principal Assistant at Purulia becoming the Deputy Commissioner and the Agent to the Governor-General, the Commissioner of Chota Nagpur.

"*The Mutiny of 1857.*—During the Mutiny, the Deputy Commissioner, Captain Oakes, was obliged to abandon Purulia on account of the attitude of the local garrison consisting of 64 sepoy and 12 sowars. The garrison then looted the treasury, released the prisoners in the jail and marched off to Ranchi without creating any other serious disturbance within this district. In the absence of the sepoy and of any constituted authority, the jail birds and other bad characters led, it is said, by a member of the family of Panchet burnt the court house and the record-room and committed various other outrages at Purulia and on the road towards Raghunathpur. The Raja of Panchet, Nilmoni Singh, on being called upon to render assistance by the Deputy Commissioner had not only refused to do so but had declined to take any notice of the Deputy Commissioner on the pretext of having only a few men with him who were all required to

protect his *garh*. Less than a month later, the Deputy Commissioner returned with reinforcements from Raniganj and arrested the Raja who was sent in custody to Calcutta and not released until 1859 when all the disturbances had ceased. The prompt arrest of the Raja of Panchet and the absence of any other suitable leader, were probably the two reasons mainly responsible for the comparative freedom from trouble which Manbhum enjoyed during the Mutiny. The Santals were reported to be in a state of excitement but no actual outbreak occurred beyond a minor conflict between them and the zamindar of Jaipur which the latter was able to deal with without outside help.

"Later History.—From the Mutiny onwards there has been no disturbance and the records show a steady advance in more systematic and well-organised administration.

When Hunter wrote his *Statistical Account of Manbhum*, it appeared to him that the aboriginal races had held their ground far more successfully in Manbhum than in Hazaribagh. The causes to which he attributed this result may be quoted below:—

- '(1) Large portions of Manbhum were, and still are, covered with dense forest; and the soil is not sufficiently productive to make it a profitable enterprise to clear the land for ordinary cultivation. The aboriginal and semi-aboriginal races who subsist to a large extent on edible jungle products, and content themselves with the scanty crops which their rude systems of tillage yield, have therefore been left undisturbed in these wild tracts, which form a far larger proportion of the district than the corresponding regions in Hazaribagh.
- (2) Although the Grand Trunk Road crosses both Manbhum and Hazaribagh, it passes through a comparatively small section of the former district, and has not yet exercised an influence over the southern portion, where the aboriginal races are found in the greatest strength.
- (3) The Bhumij Kols of Manbhum, the *chuars* or freebooters of our early administrative history, are a stronger and more tenacious race than the Santals, who were driven from north-western Hazaribagh. In capacity for resisting the encroachments of Hindus, the Bhumij seem to stand midway between the Mundas of Lohardaga and the Larkas or Hos of Singhbhum, and to be hardly less exclusive than the latter race.

- (4) In close connection with the foregoing point, it may be urged that the Hindustanis, who have ousted the Santals from Hazaribagh, are more pushing and adventurous pioneers of civilisation than the Bengalis of Manbhum. Indeed, it is not improbable that the tide of Bengali immigration into Manbhum dates mainly from the commencement of British rule; while it is certain that when we gained possession of Hazaribagh, we found the bulk of the landholders to be Hindus or Musalmans.
- (5) Lastly the Santal oral accounts of the various migrations of the race, after they left their original home, appear to point to the conclusion that they were driven by the gradual encroachments of Hindus to immigrate into Manbhum, where they are now settled in large numbers. Thus the expulsion of the aborigines from the former district was continually recruiting their numbers in the latter.

"A similar comparison made now would show how conditions in the two districts have altered enormously during the last 50 years. It is large portions of Hazaribagh which are even now still covered with dense forest and Manbhum is for the most part devoid of jungle. The soil of Manbhum yields a far better rice crop than that of Hazaribagh and Manbhum supports almost twice the density of population. So far as means of communication are concerned, Manbhum with its vast mileage of railway and road communications is far in advance. The Bengalis have more than made up for the lateness of their arrival in the country and Manbhum has been more nearly Hinduised than any other district in the division. The total number of persons recorded as animists at the last census was 29,805 in Manbhum as against 65,869 in Hazaribagh. From the point of view of education and material prosperity Manbhum is now far in advance of Hazaribagh. Thus considered from every point of view the scales have been turned and Manbhum is now far in advance not only of Hazaribagh but in the whole of Chota Nagpur. Whether Hazaribagh will again go ahead when the Karanpura and Rampur-Bokharo coalfields are fully opened up is very difficult to say.

"Some of the most important events which occurred during the last 60 years will now be noticed below:—

The Revenue Survey.—The Revenue Survey Operations in the district spread over six years from 1861–1867. The progress of the operations will appear

from the following account taken from the note on the operations of the survey in Chota Nagpur. "The demarcations were commenced in 1861-62. During the year nine *parganas* containing 1,715 villages covering an area of 1,072 square miles were demarcated. During 1862-63, 2,069 villages were surveyed covering an area of 1,427 square miles. 3,292 villages were also demarcated. During 1863-64, 992 square miles were surveyed of which 74 square miles were surveyed topographically. In addition 16 *parganas* were demarcated, seven *mauzawar* and nine *parganawar* equal to 195 running miles. The latter included 153 Ghatwali villages. During 1864-65, eight *parganas* were surveyed, five *mauzawar* and three topographically. 390 villages containing Ghatwali lands covering an area of 400 square miles were demarcated and mapped. During 1865-66, 1,034 square miles were surveyed comprising 941 villages, two *parganas* only were surveyed *mauzawar*, the remainder of the work being topographical. During 1866-67, the survey was completed, nine *parganas* having been surveyed topographically with the exception of Ghatwali tenures which were demarcated—the remaining *parganas* were surveyed *mauzawar*.

"Considering the difficulties involved the operations were carried out with wonderful accuracy and the maps prepared were of very great help in the present operations, except in the case of village appearing on the margins of sheets where owing to the absence of margin *milan* some glaring discrepancies were found to exist.

"The Revenue Survey disclosed some 3,000 villages in Panchet which appeared to have altogether escaped assessment at the time of the Decennial and the Permanent Settlements. In his letter now. 915, dated the 23rd April, 1867, the Commissioner solicited permission from the Board to institute resumption proceedings in respect of these villages. But this proposal was not sanctioned as it was considered inexpedient to sue under Regulation II of 1819 for the resumption of the lands in view of the insufficiency of material on which the claim was based. It appears probable that *tolas* or portions of villages were surveyed as separate villages at the time of Revenue Survey and that in reality so many as 3,000 villages had not escaped assessment. This view is supported by the recent High Court decision regarding Digwari villages

in which it has been held that the Permanent Settlement was made in respect of all the lands included within the ambit of the Panchet estate excepting Digwari lands which were treated as part of the estate though excluded from assessment.

"It was during the course of Revenue Survey that Major J. R. Sherwell discovered the existence of coal in *parganas* Jharia, Katras and Nawagarh. He reported the facts with remarkable accuracy to the then Member of the Board of Revenue who was also the President of the Asiatic Society. The Subdivisional Officer of Gobinpur, Mr. C. N. Pierson, who was asked for a report on the subject corroborated Major Sherwell's report in all particulars. Samples of the coal which were submitted were, however, declared by the Curator and Registrar of the Geological Museum, Mr. A. Tween, to be of the poorest and most inferior quality and to be practically worthless, except perhaps for burning lime. Though Mr. Sherwell questioned the result of Mr. Tween's analysis, the Local Government took a different view and thus lost for ever a glorious opportunity of acquiring the sub-soil rights which the proprietors were then willing to lease out at the low rate of three rupees per *bigha*.

"*Agrarian troubles in Tundi.*—Agrarian troubles threatened in 1869 and 1870 between the *zamindar* of Tundi and his Santal *rai*yats mainly over the question of enhancement of rent and jungle rights. Only the *rai*yats of 52 villages which had Santal Manjhi *ijaradars* were concerned in this affair but their attitude was such that the *zamindar* had to run away from Tundi and take refuge with his relative the *zamindar* of Katras. The tenants did not however so much dislike the *zamindar* as his *Dewan* who had been committing oppression on them in various ways. Finally affairs came to such a pass that the Commissioner, Colonel Dalton, had to interfere and exert his personal influence to bring about a settlement. According to the terms of the settlement which were embodied in his *rubakari* of 1870, the existing rents were made current for a further 7 or 8 years but the *zamindar* was assured of a moderate increase in rent at the end of that period. The tenants had their rights in the land and in jungles confirmed. The *zamindar* was also enjoined to have direct personal relations with his tenants and was forbidden to employ an agent. The informal settlement thus carried out was again renewed ten years later by Mr. Hewett, the Commissioner, and given effect to

by Mr. Risley and again after a lapse of 20 years by Mr. Bradley Birt, both Subdivisional Officers of Gobindpur.”*

The formation of Manbhum district, the setting up of Dhanbad first as a subdivision, then as a sub-district and the ultimate creation for a separate district of Dhanbad with headquarters at Dhanbad have been described elsewhere. A part of the later history has also been indicated in the texts on Law, Order and Justice and General Administration.

Regarding the formation of Manbhum district of which the present district of Dhanbad then known as Govindpur subdivision was a part of the district of Manbhum of which H. Coupland mentions as follows:—

“When it was first established in 1833 under Regulation XIII of that year, it included the estate of Dhalbhum, now attached to Singhbhum, besides a large part of the present district of Bankura, and Shergarh, now a part of Burdwan. In 1845 the estate of Dhalbhum was transferred to Singhbhum, and in the following year, owing to a press of criminal cases, the fiscal divisions of Shergarh, Chaurasi, Mahisara, Cheliama, Chatna, Nalichanda, Bankhandi, Barpara, and portions of Banchas and Para were placed under the criminal jurisdiction of Bankura district, though remaining a part of Manbhum for revenue purposes. At this time the nominal area of the district was no less than 7,896 square miles comprised in 31 zamindaries. In 1871 Shergarh with part of Pandra (east of the Barakar river) was transferred to Burdwan, and Chatna and Mahisara to Bankura, while the criminal jurisdiction of the remainder was re-transferred to Manbhum the civil, criminal and revenue jurisdiction being made conterminous. A further change in the jurisdiction of the district was made by the Government orders of the 27th September, 1879, by which *parganas* Supur, Raipur, Ambikanagar, Simlapal, Bhelaidiha, Phulkusma and Shamsundarpur, comprising Raipur, Khatra and Simlapal *thanas* were transferred to Bankura district, thus reducing Manbhum to its present limits. The final change in jurisdiction originated in a representation made by Messrs. Gisborne & Co., who held a considerable portion of these *parganas*, and with some reason complained of the inconvenience and hardship to people having to go to Purulia and Ranchi from these areas,

*Quotations from Gokhale's *Final Report of the Survey and Settlement Operations in the district of Manbhum* (1918—1925), pages 19 to 25. (P.C.R.C.).

the distances being great, and also of the delay in disposal of cases in Manbhum which, they said was under-officered, while work in Bankura was light.

Since 1879 no changes have taken place in the jurisdiction of Manbhum, though in 1904 it was seriously contemplated to cut off the whole of the northern subdivision, and form it with Raniganj into a separate district, which would have contained within its boundaries the greater part of the existing coalfields of Bengal. Other counsels, however, prevailed and the main objections to the then existing arrangements were met by the removal of the headquarters of the Raniganj subdivision to Asansol, and more recently of the Govindpur subdivision to Dhanbad, both of which places are more centrally and conveniently situated with reference to the actual coalfield areas."

There are old English Correspondence Volumes in Manbhum Collectorate (now Purulia) which had been studied and some of the letters received and despatched throw a flood of light on various matters in Govindpur subdivision for some decades after the creation of the subdivision.

Govindpur subdivision appears to have been created in 1852. The first headquarters was at Bangsooma which in the old correspondence has also been spelt as Bagsooma. The headquarters was shifted to Govindpur and again a few years later to Dhanbad which used to be spelt before as Dhanbaid. Coomer Harrendra Krishna, Deputy Magistrate and Post Master, Govindpur in a letter dated the 31st March, 1854 to the Principal Assistant Commissioner, Purulia, had mentioned that Govindpur subdivision was created at the later end of 1852. He mentioned that "the establishment of the new police on the Grand Trunk Road has put a stop to a vast extent the commission of crimes. The detection also has not been less. I have not yet been able to ascertain fully whether the criminal classes are protected and encouraged by the zamindars or other influential persons in this district."

There is a statement of the Joint Magistrate of Govindpur as to the prices of labour and materials required for the annual repairs of 1853-54 to the Deputy Magistrate's bungalow at Bangsooma on the Grand Trunk Road. It is interesting to find that carpenters and masons were available for Rs. 5 or 6 per month, coolies for one anna per day, a woman coolie and a boy coolie for 9 pies per day. As regards prices of some materials it may be mentioned that shell-lime was available at 20 seers per rupee, ghooting-lime at Rs. 14 per 100 maund, grass bundles at 400 per rupee, bamboo per 100 for 1 rupee and 2 annas and nails at 5 seers per rupee. Large wooden posts (*bullees*) were available at 6 annas per piece while small posts for 3 to 4 annas per piece.

By 1853 it appears that a full-fledged post office at Govindpur was running under Coomer Harrendra Krishna, Post Master. On the 9th April, 1853 he had protested about the inadequacy of the contingent allowance of one rupee per month. There are copies of several letters of Coomer Harrendra Krishna in the correspondence file for 1853. Harrendra Krishna was the Deputy Magistrate at Govindpur and apparently the postal work was an additional function.

In one of the letters dated the 1st September, 1853 he discusses the location of the police establishments on the Grand Trunk Road (station houses and Marhullahs). In this letter he mentions that "from one end to the other of the subdivision, the Grand Trunk Road at places is either very high or low and places where the police has been stationed as such as the locations of them is absolutely required and the danger likely to meet with was palpable. A single change to this admirable arrangement will deteriorate a great deal the usefulness of the force."

Regarding *chuttees* and *serais* the correspondence is quite frequent, Mangles, the Magistrate at Govindpur on 21st August, 1854 had reported to Captain G. N. Oakes at Purulia that there were four *chuttees* (small *bazars* with *serais* or inns where travellers could stay) at Neersha, Govindpur, Rajabhitta and Topchancee. The *chuttees* were at distance of about 12 miles from each other. The Chowdhry of each of the *chuttees* in Govindpur subdivision received from Government a salary of Rs. 4 per month. The Chowdhry was the agent of the Government to look to law and order and particularly to procure provisions for the troops that may halt at *chuttee* or for other Government purposes. The Chowdhry of *chuttee* Govindpur claimed that he could provide for a whole regiment without previous notice. But the Chowdharies of Neersha, Rajabhitta and Topchancee could not do this. At Govindpur there were 40 *moodies*, at Neersha 18 and about 23 at Rajabhitta and Topchancee respectively. All the *chuttees* could supply rice, *dal* and salt in large quantities. In *chuttee* Govindpur grain of various kinds, *ghee*, flour, oil and tobacco could be found. Water was available at all the *chuttees* from neighbouring rivers, tanks or wells. Neersha *chuttee*, however, did not have a good supply of water and it had to be procured from a small river about a mile distant. Hackeries could be obtained at each of the *chuttees*. The four *chuttees* had encamping grounds close by. The encamping grounds were elevated and well turfed. The encamping grounds were looked after and the regiments halting there could always get necessary food and water from the *chuttees*.

From a letter dated the 7th March, 1859 from A. P. S. Moucriff to Captain Oakes, Principal Assistant Commissioner of Manbhum, it appears that Mangles had obtained sanction in 1855 to build *serais*

at all the *chutties* at a cost not exceeding to Rs. 50 each and the *serais* at Topchancee, Rajabhita, Govindpur, Neersha,* and Neamutpur were let out to private parties and were giving a regular return. The charges made at the *serais* were for keeping of two bullocks, 1 pice, four bullocks, 2 pice and so on. Moucriff pointed out that excepting the *serai* at Govindpur which was given a *pucca* wall the other *serais* required repairs. The *serais* were too small to contain half the hackerees that wanted to stay. He thought it would be better if Government instead of keeping up those *serais*, sell the ones now in their possession by public auction and give licences to any private parties wishing to make *serais* at their own account charging 20 or 30 rupees annually for such licence.

In 1855 encamping grounds were paid a good deal of attention. There is a long letter from Mangles to G. N. Oakes, Principal Assistant Commissioner, Purulia, dated the 2nd June, 1855 in which he discusses the position of the encamping grounds and mentions that "the construction of encamping grounds from Calcutta to the Carumnasa ought however to be on one systematic plan and the arrangements for supplies and carriage ought to be similarly carried out."

I. H. Mangles was a Joint Magistrate of Govindpur in 1855 and some of his letters give us a picture of the administration of his subdivision the headquarters of which was later removed from Bagsooma to Govindpur. In a letter dated the 6th March, 1855 from Mangles to Captain G. N. Oakes, Senior Assistant Commissioner of Purulia, it appears that there were three *thanas* in Govindpur subdivision and only one of them, viz., Rajabhita was conducted by a regular police establishment. The two other *thanas* Pandra and Tundee were under an *Illakadar* or zamindaree police. Mangles found the regular police establishment of Rajabhita inefficient and "the burkandages were accustomed to consider the travellers of the Grand Trunk Road fair objects of plunder". The zamindaree* police at Pandra and Tundee* were thoroughly useless and the police powers were being used by the zamindars for oppression of the people. Mangles noted that the quarrels about land were the real cause of most of the crimes and the *Illakadar* or zamindar was an interested party in such quarrel, "he is certainly most unfit to investigate or repress".

Mangles took a good deal of interest to develop the roads of the subdivision. Mangles had set up on his own a modern *serai* at Govindpur on the Grand Trunk Road. He had taken a plot 121 feet by 112 feet surrounded by a mud wall covered in 8 feet high with a long shed along one side for cooking and sleeping in and a large gateway opening to the Grand Trunk Road. On the 1st May, 1855 he wrote that the *serai* had been opened for one week only

* The old spellings are retained (P. C. R. C.).

and was already well patronised. He wanted Government sanction of the construction money as a loan. He mentioned that the travellers resting there commonly say "we have heretofore been obliged to watch, we can sleep in peace tonight". From this letter it appears that the Grand Trunk Road used to be patrolled by the Magistrates occasionally and dacoities were very common. Mangles was of the firm belief that the travellers would certainly prefer to stay in the *serais* of Government than to entrust their life and property to the *serais* run by the Zamindars.

There is a letter dated the 10th September, 1855 from H. C. Bernard, Joint Magistrate, Govindpur to the Principal Assistant Commissioner at Purulia pointing out the necessity of the transfer of Chirkoondah *Marhullah* to Govindpur Road police establishment. From this letter it appears that although the 'Marhullah' of Chirkoondah was situated about 200 yards this side of the Barakar river and within the *Jemadaree* of Neersha in Govindpur the *Marhullah* police were under the Joint Magistrate of Raneegunge. Bernard further pointed out that the Barakar river should be the eastern boundary of the Govindpur subdivision and that 9 *mauzas* on this side of the river within Chirkoondah *Marhullah* jurisdiction be added to Govindpur jurisdiction. It may be mentioned that this idea was later carried out.

1857 INSURRECTIONS.

The Old Correspondence Volumes for 1857 and the years following naturally have some information regarding the insurrection of 1857 and its aftermath. It has to be remembered that the Record Room of Purulia has been burnt down and most of the records went into the flames and it is a wonder that these correspondence volumes were salvaged. From a letter of the Inspector of Jails, Lower Provinces to the District Magistrate dated the 30th September, 1857 it appears that bad characters who were sentenced above three years to serve were sent to Alipur Jail under proper guard. G. N. Oakes, Principal Assistant Commissioner, Manbhum wanted further to send the prisoners sentenced from 2 to 3 years confinement as well to some other Jail as the Purulia Jail was rather insecure for such men and requested the Inspector of Lower Provinces to suggest where they could be sent.

It may be mentioned that Capt. E. I. Dalton, Officiating Commissioner of Chotanagpur in a letter no. 66, dated the 19th April, 1858, had mentioned that along with other districts, this district also in Chotanagpur had landlords who did not as a body help in Mutiny of 1857. Dalton thought that most of the rural population were favourable to Government although they could not resist the temptation of following any chief who will lead them on the plundering expedition. From another letter it appears that iron-smiths of Jhalda and Sillee in the Sadar subdivision now Purulia

district had supplied the Porahat rebels with matchlocks. One Raghoo Deo was arrested who made a confession and produced 30 matchlocks all quite new. The confessing prisoner was convicted by Dalton and hanged.

From some letters in the Old Correspondence Volume for 1862 it appears that certain Santals had been convicted for plundering the house of many persons within *thana* Chas in the wake of the troubles in 1857. There were also similar plunderings of property in villages in the subdivisions of Govindpur by the Santals. In 1862 G. N. Oakes was asked as to whether these Santals convicted for looting properties in Govindpur subdivision could be released or not as they served out a part of the offence. G. N. Oakes as Deputy Commissioner said that he had no objection to their release.

POLICE ORGANISATION.

Some of the police *thanas* at that time were run by the zamindars and some by the Government. The zamindari police and *Darogas* were under a certain amount of control of the District Magistrate and the Police Chief who used to supervise their work and inspect their registers. An old document lays down certain rules relating to the conduct of cases and for commitments for the guidance of all zamindari police in the Chotanagpur division which is available in the Old Correspondence Volumes for 1858. The *Darogas* of zamindari police were furnished with a blank book for a diary, the pages of which were to be signed and numbered by the Magistrate or his Assistant before it leaves the office. Daily occurrences were brought to the notice of the Police Officers and all orders issued and steps taken were to be recorded in this book. It appears that the *Darogas* used to record the statement of the prosecutor or former on oath or a solemn affirmation and then the original was to be despatched to the Magistrate. It was further mentioned that the officer in charge of the district would take every opportunity of carefully examining the original diary. No deposition of witnesses examination or confession of the prisoners were to be recorded at all by the police. The police might, however, act on admissions voluntarily made and use them as clue to evidence. If evidence as to admission was to be sent to prisoners named witnesses on their behalf, the *Daroga* should cause them to attend before the Magistrate. If the *Daroga* thought that the accusation against the prisoner was not substantiated, he would immediately admit the accused to bail and submit a concise report to the Magistrate. If the charge was well grounded and investigation was complete the *Daroga* should send up the accused with the property recovered. It appears that the policy was to gradually withdraw police powers from landholders and invariably the powers were withdrawn during the period when their estates were under attachment or whenever the zamindars were found misconducting themselves.

The rural police of Manbhum could be divided into *Jagirdars* (*Tabedars*), *Ghatwals* (*Sardars*, *Suddys*, *Tabedars*), *Digwars*, *Choukidars* and *Goraitis*. The *Jagirdars* originally rendered a double service, one to the zamindar in guarding his castle and the other to the public and Government, viz., in preserving the peace and assisting the regular police. The *Jagirdars* were repaid by a grant of land with a very small rent. Slowly his services rendered to the zamindar ceased and the duties of the *Jagirdars* became wholly those of the police. The tenures of the *Jagirdars* came into existence from before British rule in India. In 1864 there were fifty-six *Jagirdars* under whom were five hundred *Tabedars* in Manbhum. The relative number of *Tabedars* under each *Jagirdar* varied. Both the *Jagirdari* and *Tabedari* tenures were usually hereditary and were mostly found in Panchet.

The *Ghatwals* were originally the guardians of *ghats* or hill passes and their duty was to protect travellers, keep the *jungles* clear of dacoities and to trace offenders. The *Ghatwals* were also expected to give aid to people. Under them were *Suddys* and *Tabedars*. The *Suddys* were middlemen transmitting orders from the *Sardar Ghatwal* to the *Tabedars* collecting the rents of the *Ghatwali* lands. The duties of the *Digwars* were precisely similar to that of the *Ghatwals* except that they were not found in charge of *ghats*.

In 1864 the number of *Sardar Ghatwals* and *Digwars* was 604, of *Suddys* and *Tabedars* 2,076. The land held by the *Sardar Ghatwals* and *Digwars* varies in extent, some holding as much as eleven *mouzas* while the average hold only one. At this time there were 259 *Ghatwali mouzas*. In this year there were 2,772 *Choukidars* in Manbhum. In a few instances they were paid by a small amount of land but generally by a tax levied on the villages. The *Choukidars* who have *chakran* land were succeeded by sons or heirs. The *Choukidars* rendered police work while the *Goraitis* were more of the zamindars over servants and merely rendered aid for the zamindars police work in a general way.

The system had not worked well and had thrown more power to the zamindars. According to Money, Deputy Commissioner of Manbhum the *Choukidars* were usually cognizant if not accessories of offences.

Regulations for the control of the rural police were taken up by the Deputy Commissioner in right earnest. The *Digwars*, *Sardars* and *Ghatwals* were saddled with full responsibility with respect of crime that occurred within their own districts. The general standard in the care of rural police was lower than the regular police force. Hereditary considerations were the rule in filling up vacancies in the rural police force was not always very good.

The incidence of crime had definitely gone up in 1866. Poverty was one reason. There was widespread distress and more want of food and rather than want of money.

Money was vigilant about the rural police. He toured extensively through the south-east of the district and found that at places the police were working inefficiently and not helping the starving people. He was particularly anxious that the growing crops should be protected "from the depredations committed by the starving people". The letter to Capt. Judge, District Superintendent of Police of Manbhum on the 17th October, 1866, gave a series of instructions as to how the Sub-Inspector should visit each *ghat* and be in personal touch with the *Ghatwals*. He mentioned "If these instructions are promptly carried out, I hope the safety of the crops will be ensured. As the *Ghatwals* are just sufferers from famine and many of the lower grades are labourers and as badly off as they were starving neighbours, it is to be feared that unless sharply looked after they will connive these offences and it is for this reason that I should have sufficient constables in the *pargana* to go continuously round the *ghats* to see that these *Ghatwals* are at their posts." Money was in constant touch with S. Hugg, Chairman of Bengal and Orissa Relief Committee.

R. C. Money on the 6th February, 1867 had recorded his observation on the disposition of police forces in Manbhum district and held that the matter required very great revision. He found the arrangement by which Govindpur was left to the care of an Inspector bad and the result had been shown during the famine.

If the Assistant Commissioner and the Assistant Superintendent were together at one station naturally there would be unofficial inter-communication. There was no Assistant Superintendent of Police at Govindpur and the Inspector there had few ideas beyond obtaining convictions. Money found that neither the Inspector of Police nor the Assistant Commissioner had much idea of the extent of the famine in Govindpur subdivision. The *Digwars* had not been properly controlled and the dacoity cases had not been properly supervised. The *Digwars* had been informed of the dacoity cases by the villagers. Money felt that if there was a proper system of supervision the *Digwars* would not have neglected their duty. Money wanted that Govindpur should have an Assistant Superintendent at headquarters with two Inspectors. He further recommended that without reading and writing Bengali no police men should rise above a post of constable. Each outpost should be under a head constable. The Inspector and the Sub-Inspector under him would have to visit every village in his subdivision every month and so keep a record having done so.

JUDICIAL STAFF.

Inefficiency of Judicial staff was noticed and adversely commented upon. The Deputy Commissioner wanted more staff and thought the far too small staff led to inefficiency. The upper Judicial and Executive staff was also not sufficient. The staff at Sadar subdivision of Purulia consisted of (1) the Deputy Commissioner who was

Magistrate, Collector and Principal *Suddar Amin*, (2) Assistant Commissioner with full Magisterial and Collectorate power and Principal *Sadar Amin*, (3) Assistant Commissioner who is Deputy Collector, (4) A Munsif with 1st Class Magisterial power. At Govindpur subdivision there were Assistant Commissioner with 1st Class Magisterial power and a Munsif as well. One Munsif was posted at each of the places Chatnah, Raghunathpur and Manbazar.

Mr. Money compared the volume of work in 1866 with the volume of work in the Inspection Report of Rickett in 1854 and showed how the work has increased. He mentioned "I think it will be seen at a glance that the increase of an establishment between 1854 and 1866 is not sufficient to provide for satisfactory performances of increase in work." Money gave his suggestions for increasing the staff.

PUBLIC PROSECUTORS.

It appears that in 1858 lawyers were ordered to be retained for conducting the civil and criminal cases for and on behalf of the Government. In his letter no. 109, dated the 28th December, 1858, Dalton, Commissioner of Chotanagpur reported to A. R. Young, Secretary to the Government of Bengal that considerable difficulties were being felt in Manbhum district where suits in which Government was a party were of frequent occurrence for the want of a duly competent person to assist in preparing the pleading and watching the interest of Government while the suit is pending. *Vakil* on the part of Government was engaged in Hazaribagh district for similar purposes. Dalton pointed out that in the Lohurdugga district such cases were not frequent but as several estates of rebels had recently been confiscated and there was shortly to be a settlement of *pergunnah* Palamau in the course of which intricate questions would be raised, it was desirable that the services of a good *Vakil* should be permanently entertained. Lohurdugga district now Ranchi at that time had the present district of Palamau as a part of it

Dalton further pointed out that in criminal cases in the three districts of Manbhum, Hazaribagh and Lohurdugga the practice of having a counsel for the prosecution on the part of the Government was seldom resorted to and when thought necessary an officer of the court was directed to undertake the duty which was very inefficient and objectionable method. Dalton recommended that "there should be a Public Prosecutor both for civil and criminal cases" and pointed out that "in many miscellaneous matters such as the rights of Government to unclaimed property of the zamindars, Government was very badly represented". He mentions in that letter that the interests of the zamindars are in such cases generally opposed to the interest of Government but as they are also the officers of the police there is no one else to report them. Dalton recommended that a Government *Vakil* be allowed for each of the three districts mentioned before and that one for Ranchi will also look after the cases in the

Commissioner's court. It will be interesting to mention that he had recommended Rs. 30 per month for the Government *Vakil* at Ranchi, Rs. 20 per month for Manbhum and Rs. 15 per month for Hazaribagh.

LANDMARKS, ADMINISTRATIVE.

The police administration of Manbhum including the subdivision of Govindpur was described by G. N. Oakes, Deputy Commissioner of Manbhum to the Commissioner in a despatch no. 27, dated the 28th January, 1862. This is an interesting document and shows that there were 5,066 villages in the district including the subdivision of Govindpur and a population of 670,885 souls. For this population and the villages there were 2,769 *Choukidars*, 629 *Digwars*, *Sardars*, *Ghatwals* and 2,266 *Tabedars* or a total of 5,664 village police and less than 1 per cent to the population. Oakes mentioned that there were many insignificant villages which had no *choukidars* at all and also some villages that had two or more *Choukidars*. According to Oakes, the *Choukidars* in many instances were unpaid or very irregularly paid. The highest pay was Rs. 36 per year and the lowest annas 6 per year. The villages in which the *Choukidar's* pay does not amount to more than annas 6 did not contain more than six huts. 669 *Choukidars* belonged to the subdivision of Govindpur. The *Digwars*, *Sardars*, *Ghatwals* and also a few *Choukidars* had lands given to them instead of cash payments. Oakes proposed that the district of Manbhum with 3,696 square miles could be well divided into nine subdivisions each of which would contain one police station and eight outposts. A total number of 441 constables would be required giving to each police station one head constable and one constable and to each outpost one sergeant and four constables. The average number of villages which every constable would have to see daily would be about 14. Oakes pointed out that he would require a reserve body for any emergency and also a number for performing the duties of new road police in Grand Trunk Road and for all this he would require 300 men and so the total number of constables including head constables and sergeant would be 741.

From another letter it appears that the road between Govindpur and Ranchi was under construction in 1862 and weekly reports were insisted on.

In 1864 the roads of Govindpur subdivision were taking shape. The road from Govindpur to Ranchi was the particular obligation of the Assistant Commissioner who also was improving the station roads, road round Ketka and Landiha. Road *Mohurriars* were appointed and it was difficult to find contractors. Rupees 5,000 per year used to be spent in clearing the jungles of both sides of the Grand Trunk Road. The Commissioner Dalton had issued an order in December, 1864 that the zamindars were obliged to keep the roads

within their jurisdiction clear of jungles as they were bound to afford protection to travellers. Dalton was very keen to give every possible encouragement to settlers on the sides of the roads.

GRAND TRUNK ROAD.

Grand Trunk Road was the principal trans-district artery and naturally Grand Trunk Road had to be given a certain amount of particular attention. Regulation XIV of 1807 required that the persons in charge of the public *Sarais* should give the police daily reports of the arrival and departure of the travellers and of all persons of suspicious appearance. The *Chattis* throughout the area were patronised by thousands and thousands of travellers who were perpetually on the move specially on the roads leading to Jagarnath. Mostly they travelled on foot and had to eat and sleep at the *Chattis* on the roadside. A letter mentions "these *Chattis* are kept most of them by *Modis*—the generality of whom are accomplices of thieves and robbers who plunder the unfortunate travellers whenever a fitting opportunity occurs. The Commissioner Young of Burdwan had suggested to the Secretary to the Government of Bengal that the keepers of the *Chattis* should be obliged to take out a license. This license would give the privilege of receiving travellers at certain rates and compelling the payment of certain charges. It would oblige them to receive and give accommodation to all wayfarers and to protect and be responsible for all the property so long as it was in their premises.... It would of course be necessary to protect such men as would take out the license for loss by declaring it a penal offence for any one without license to follow the same calling."

Highway robbery cases on Grand Trunk Road particularly in the Govindpur subdivision was quite common. Even parcel vans going to the north-western provinces by Grand Trunk Road were subjected to highway robbery cases within the Govindpur subdivision. Bullock-cart trains moving in the night were frequently attacked. There was one such serious highway robbery case at Tantua village on the Grand Trunk Road in October, 1861.

The Grand Trunk Road of course had received much more importance as the main artery because of the 1857 disturbances.

RECRUITMENT OF COOLIES.

At this time it appears a large number of coolie recruiters used to move about throughout the district and recruit coolies. R. C. Money, Deputy Commissioner of Manbhum in his letter no. 797, dated the 15th June, 1863, reported to the Commissioner of Chotanagpur that as no register had been kept in his office either of coolie recruiters or of emigrants nor were licenses issued for recruitment and countersigned, he was unable to give any correct statistical information. In the Govindpur area complaints had been made and

proved against recruiters. The classes that emigrated were Kols, Santhals, Bhoomiz, Rajwars, Koormees, Harrees, Bawree and Jolahas. But the two classes that formed the bulk of recruiters were Bhoomiz and Santhals and most of them went to Mauritius. From Govindpur subdivision a very large number of recruits used to be sent to Assam and Cachar. Money reported that the recruiters used to prowl about on the Trunk Road and pick up travellers. Money thought that the rule of paying recruiters head money on the coolies recruited was bad and they had better be paid fixed salaries. He thought that the recruiters must be controlled and particularly mentions the case of a female emigrant who was with a recruiter against her own will and the recruiter said that he had bought her for two rupees eight annas.

Money wanted a ruling from the Commissioner if he had any option and was just obliged to countersign as many licenses as were brought to him by the coolie recruiters. It was the considered opinion of Money that most of the coolies were under incorrect views as to what is there in future. The coolies were imported under false pretence and hence they were later found to be insubordinate in gardens. On an arrival at a tea plantation, Money thought the coolie found his life not the easy one he expected, his wages were small, work extremely hard and a desertion was a breach. According to Money the coolie should be made to sign the contract in presence of the Magistrate and the Magistrate should explain to the coolie the terms. Money wrote that his district was overrun with coolie recruiters and while few coolies were brought for registration much more were taken away. He also thought many girls were enticed away from their houses and husbands.

There are interesting letters to show that Money took a very strong view against the manner in which coolies were being recruited by the agent of the Labour Transport Company. There were cases where the coolies in Purulia had died at depots and owing to over congestion in the coolie barracks cholera had broken out. Mr. Money wanted that coolie recruitment should abate.

An interesting document in the Old Correspondence Volume of 1867 is a report that the recruitment of labourers for the tea district was affecting the agricultural interests. It was mentioned that the persons recruiting for labourers for the tea district instead of taking whole families took only persons fit for labour. It was suggested that it would be much better if the recruiters took away whole families.

FAMINE AND SCARCITY.

Famine and scarcity conditions in 1866 was a major problem in Manbhoom district. There are quite a number of important letters about famine conditions and the steps taken to combat. Depots were opened at different places where the starving people

who were unable to work were given rice. The zamindars of Barabhum, Ambikanagar and Raipur were instructed to collaborate. The road between Raipur and Ambikanagar was taken up to give work for such people who were physically fit to work. The Deputy Commissioner, Mr. Money in his letter 309, dated the 5th June, 1866, reported to the Commissioner that arrangements had been made to give gratuitous relief to 450 people daily and work to 1,000 persons daily. The price of rice at Barabazar had risen from -12/- to 9 seers per rupee, at Purulia -12/- to 7½ seers per rupee. The dacoity cases owing to starvation had gone up tremendously. The *Modis* (grain merchants) were combining at most places and refusing to sell although they had sufficient stock. Relief centres at Barabhum were largely attended. The construction of a road between Purulia was recommended by Money as offering work to the able bodied people. Grain dacoity in Barabhum had increased to such an extent that three or four were committed every night. There was no attempt to conceal the motives and freely confessions were made that as there was no food for two or three days they could do nothing but committed robbery. In a letter 342, dated the 12th June, Money reported: "There is fearful distress among the Santhals, Bhoomiz, Harrees, Bawree and such tribes known by the general terms Chauhars. Thousands of these people have nothing to feed on but the grass, roots of trees and the seed of the *sal* tree. Many have died of starvation or diseases caused by it and the distress is daily increasing." He controverted the idea that there was any desire on the part of these Chauhars to rebel or cause disturbance. The dacoites were committed because of hunger and it was just possible that some of the Manbhum Chauhars being on the border had committed some dacoities in Midnapur district. Money felt that this distress was likely to go on increasing for two or three months and strongly urged import of grain and disposing of it among the starving Chauhars. He thought that the means taken by the Relief Committee were not adequate. The rural police had been affected by the prevailing distress and some *Ghatwals* who were poorer were mixed up with dacoity cases. He wanted grains to be imported and given to the poorer *Ghatwals* of whom there were some 2,000 or 3,000 in the districts. In another letter, dated August 8, 1866, Money informed the Secretary to the Board of Revenue that rice was selling in Purulia at 4½ seers per rupee and was so dearer in other districts and the distress was rapidly increasing.

Cholera had also broken out and owing to heavy rains and impossibility of getting carts he had received only 1,001 maunds of rice that the Government had sent. He mentioned "The scarcity is so great that I am obliged to accept contracts at whatever rates they were offered and I have just asked for 100 carts at annas 18 per maund, the usual rate being annas 4 per maund." He strongly urged the necessity of sending more rice from Calcutta. He mentioned that although the bazar rate is 4½ and 5 seers they were

selling Government rice at $7\frac{1}{2}$ seers, and thereby committing a direct infringement of the rules on the subject but the emergency made him to do so. He mentioned "The Government rice is not only rising favourably and by selling at $7\frac{1}{2}$ seers I am able to afford those who were willing to buy the means of purchasing food." On 20th August, 1866 Money addressed a frantic letter to the Assistant Commissioner of Govindpur as to why he had not sent any report on the state of the people and the distress in spite of repeated requests. In this letter Money mentioned that zamindars of Jharia had reported 600 deaths in the *pargana* from starvation and the Rani of Pandra was feeding 1,700 starving people daily and there were similar reports from other quarters. He mentioned "if this is the case it is evident that relief is greatly needed in some parts of the subdivision and the Committees are prepared to open fresh depots wherever needed". He asked the Assistant Commissioner to send a weekly report as to the state of each *pargana* in the subdivision. According to Money's information there was more distress all along the Trunk Road.

He asked the Assistant Commissioner to proceed to Bankura and make arrangements for sending immediately the remainder of Government rice. From another letter it appears that the work at the centre of Government grain at Barakar was extremely heavy and a Special Officer was sent there to work the centre. It appears that this officer was one C. Dalton. Dalton was asked to take full charge of the centre and the instructions urged "make what further arrangements may be necessary to make the contractors to bring the rice over here now in good order". In another letter, dated the 10th September, 1866, that Money sent to the Rani of Pandra, he complimented the Rani for the liberal manner in which she was treating her poor raiyats in the famine and this was in great contrast to the apathy shown by the zamindars of the other districts with the exception of the Barabhum and Jharia Rajas.

In his letter 1066, dated the 31st October, 1866, to S. Hugg, he gave a general survey of famine measures. From this letter we find that there were exclusive of the subdivision at Govindpur 22 depots. These depots were expected to be closed towards the end of December. He discussed about the money grants and the rice subsidies and thought that it would be a calamity if the depots were closed earlier. He gave figures and wanted Rs. 13,000 for running the 22 depots till the end of December. Greatest distress had prevailed to the south-east of the district. The combination of the *Modis* particularly at Purulia was breaking and the situation was easing up. Work was provided on the district roads and the depots were daily weeded by those who can work and was being drafted into the roads. Unfortunately, Money had to work here against the severe outbreak of cholera as well. Even the courts were affected and very few of the *Amlas* were attending regularly. At one point

Money was asked to close the court but he would not do so and carried on the work as best as he could. As a result there was an accumulation of cases and a lamentable detention of witnesses.

TRANSFER OF JURISDICTION.

Another document no. 1244, dated the 25th February, 1859, from C. I. Buckland, Junior Secretary to the Government of Bengal, to the Commissioner of Burdwan Division shows that the villages Bormooree, Churkoonda, Rapunshara, Doomurkoonda, Jagaradee, Notoongram, Chanch, Nepoora, Khyrkyaree were transferred from the criminal jurisdiction of Raniganj and Bankura to that of Govindpur and Manbhoom, the river Barakar constituting the boundary line between the two districts.

PRICES.

It will be interesting to give the current prices of rice and other crops in 1867. Rice was quoted at 31 seers per rupee in Katras, but if measured by the Govindpur seer would be between 27 and 28 seers per rupee.

AGRARIAN TROUBLES—ZAMINDARS.

The documents in the Record Room Old Correspondence volumes were studied. They show that there were agrarian troubles between 1869 and 1870 between the zamindar of Tundi and his Santal raiyats mainly on the question of enhancement of rent and jungle rights. Only the raiyats of 52 villages which had Santal manjhi *izaradars* were concerned in this affair. But their attitude was such that the zamindar had to run away from Tundi and take refuge with his relatives, the zamindar of Katras. Finally the Commissioner Col. Dalton had to interfere and exert his personal influence to bring about a settlement. According to the terms of settlement which were embodied in his *rubkari* of 1870, the existing rents were made current for a further period of seven to eight years, but the zamindar was assured of a moderate increase of rent at the end of that period. The tenants had their rights in the land and in jungles confirmed. The informal settlement thus carried out was again renewed 10 years later by Mr. Hewett, the Commissioner, and given effect to by Mr. Risley and again after a lapse of 20 years by Mr. Bradley Birt, both Subdivisional Officers of Govindpur.

In 1881 there were again Santal risings here and there in the north part of this subdivision comprising mainly Tundi P.S. The Government were taking a census, and enquiries about family affairs, as usual, tended to rouse the suspicion and anxiety among ignorant people. There were riots in several places. In one of the riots, the Magistrate's house was burnt down, and in another the Magistrate himself was held prisoner for sometime by the Santals. Near about the same time there had been much excitement among the Santals on account of a preaching crusade carried on by a religious mendicant or *Yogi* known as the *Babaji*. Clad in wood and

iron, and professing to live entirely on grass and to be able to perform all types of miracle he went through the Santal country preaching a new religion. He had many followers among the Santals who used to destroy their pigs and houses to denounce their demon gods and showed more inclinations to Hindu orthodox. During the riots the *Babaji* was also suspected and he was arrested by the police. The movement, however, soon fizzled out.

In 1896-97 there was a serious failure of crops in Tundi area and the Christian Mission at Pokharia did very good work in alleviating the distress of the people. For sometime the Mission had to support about 5,000 persons every day. The name of Dr. Campbell of Pokharia Mission almost became a household word in that area. The Mission also excavated two tanks at Pokharia and constructed and repaired portions of the road up to Gobindpur.

Any history of Dhanbad district should have a reference to the land tenures and indication of the story of the old zamindaries. There were five revenue-paying zamindaries in the Dhanbad subdivision, namely, Jharia, Nowagarh, Katras, Pandra, and Tundi which have now been abolished and vested in the State of Bihar under the Bihar Land Reforms Act. The land tenures were governed by Chotanagpur Tenancy Act, 1869, Chotanagpur Tenancy Act of 1908 and Chotanagpur Encumbered Estates Act of 1908.

DHANBAD, A DISTRICT—COLLIERIES.

As mentioned before Dhanbad continued as a part of Manbhum district from 1833 to 31st October, 1956. With the decision of the States Reorganisation Commission Dhanbad sub-district with two other *thanas*, namely, Chas and Chandankiari was upgraded into a district. This district has now got two subdivisions—Dhanbad and Baghmara. Three *thanas*, Topchanchi, Baghmara and Katras were excluded from the Dhanbad subdivision and were added in the newly created subdivision of Baghmara. The Deputy Commissioner and the two Subdivisional Officers stay at Dhanbad. The official quarters at Baghmara are not yet ready (1962).

Originally the name of Dhanbad was Dhanbaid which seems to have been derived from word 'dhan' (paddy), 'baid' (3rd class), i.e., third class paddy land. When Mr. Luby was the Additional Deputy Commissioner of Dhanbad in 1918, he dropped the letter "i" and made it Dhanbad, instead of Dhanbaid and by carrying on correspondence got it approved by the Government.

Prior to 1861, there was nothing particularly noteworthy about Dhanbad then known as Govindpur subdivision, and the headquarters of the subdivision was at Govindpur, situated on the north-east of Dhanbad at a distance of seven miles lying on the Grand Trunk Road. The development of the collieries and industries along with the opening of the Grand Chord line of the then East Indian

Railway in about 1901 led to an all-round development and rapid growth of population. The population of the subdivision was 2,77,122 in 1901 as compared with 2,21,434 in 1891, the density being 345 persons to the square mile. Between 1891 and 1901, the growth of population in the Govindpur subdivision rose by 25.1 per cent. The south-eastern part of the subdivision comprising the police stations of Dhanbad and Jharia and Katras, constitutes the Jharia coalfield, the rapid development of which between the years 1894 and 1901 accounts for the large increase in the population of the subdivision as returned in 1901. During the succeeding years the development has been even more marked, and there were in 1908 no less than 281 collieries at work in this area employing a daily average of 72,000 labourers. A portion of the Raniganj coalfield falls within the eastern part of the subdivision (P.-S. Nirsa and Chirkunda). In 1908 Dhanbad became a subdivision, and the headquarters were transferred from Govindpur to Dhanbad. Between 1911 and 1921 the increase in population of Dhanbad subdivision is 5,71,635. According to 1961 census the total population of Dhanbad subdivision is 7,41,604. The great increase is due to the areas recently added and the siting of a large number of important Government institutions in this district besides the rapid strides in industrialisation. These features have been covered elsewhere. It may be mentioned that very soon Dhanbad will be one of the most highly industrialised belts in India.

Dhanbad district is now a cosmopolitan area inhabited by people from all parts of India who carry on collieries and other industries, various kinds of trades and professions in private and public sectors and under the Government. The present history of the district since its creation is covered in different chapters.

The phase of the development of coal mining in the district had started since about 1860. It is this phase which transformed the entire area from Jharia to Govindpur into one of the most important industrial zones throughout India. This part of the country which was a jungle area once and where people only dared to move about in the nights with arms has been completely changed now with the working of the many coalfields. The occurrence of abundant coal in the Jharia area was first mentioned by Lt. Harrington in 1839. A Geological Survey was made by T. W. H. Hughes in 1866. In 1887 Dr. V. Ball of the Geological Survey drew attention to this rich coalfield. In 1890 the East Indian Railway prospected the area and it was estimated by T. H. Ward that the area contains about 804 million tons of good quality coal. The East Indian Railway extended their lines from Barakar to Katrasgarh in 1894 and also laid down a branch line from Kusunda to Pathardih. From this year started the rush of speculators and businessmen to take mining leases. In 1894 the output of coal was 1,500 tons but in 1901 it rose to 2 million tons. The Bengal-Nagpur Railway had

also extended their line from Midnapur to Bhojudih in 1901. This line was further extended from Bhojudih to Gomoh by 1904. The completion of the Grand Chord line of the East Indian Railway in 1907 immediately threw open the entire country-side as the most important centre of the coal trade in India. The development of the coal industry has been traced elsewhere.

SHIFT OF THE HEADQUARTERS.

The administrative problems due to the rapid development of Jharia coalfields in Govindpur subdivision multiplied hundred fold and it was being felt that Govindpur was no longer a suitable place to be the subdivisional headquarters. It has further to be remembered that many of the important collieries were controlled by the Europeans and the Subdivisional Officer of Govindpur wanted to be near Jharia. In 1904 it was decided by Sir Andrew Fraser, the Lt. Governor of Bengal that the headquarters of the subdivision should be transferred from Govindpur to Dhanbad. The actual transfer, however, took place on the 27th June, 1908.

The tempo of development of the collieries brought out in bold relief that the Subdivisional Officer with his limited powers could hardly control the area and required much more attention from the Deputy Commissioner. In 1912 there was a proposal to transfer the headquarters of Manbhum district from Purulia to Dhanbad. This idea, however, did not get the support of Mckintosh, the Commissioner of Chotanagpur who pressed for more powers for the Subdivisional Magistrates. He was of the opinion that the subdivision should invariably be in charge of a senior and a specially selected officer who should not be disturbed frequently.

LATER EVENTS.

A separate Province of Bihar and Orissa was created on the 1st of April, 1912 and this was followed by a further expansion of the coal industries in Dhanbad subdivision. Dhanbad and her neighbourhood had more than 200 collieries being worked by about one lakh labourers. The expansion of the railways and the various institutions including technical ones that were springing up in Dhanbad gave far more prestige and importance to this place than Purulia the headquarters of the district. It was being increasingly felt that the Deputy Commissioner of Purulia was handicapped for effectively administering Dhanbad subdivision and the difficulty was further accentuated by the creation of two more Boards—the Water Board and Mines Board of Health with the Deputy Commissioner as the Chairman.

In January, 1914 an extensively-signed public petition was presented to the Commissioner pointing out the above difficulties and suggesting the appointment of an Additional District Magistrate at Dhanbad, with a Subdivisional Officer or a First Class Deputy Magistrate under him to do the court and office work. This petition

gave rise to an exchange of views between various authorities which continued till 1916, the Subdivisional Officer of Dhanbad, meanwhile, having been granted some further extension of powers, such as hearing of appeals against the decisions of 2nd and 3rd Class Magistrates under section 407 (2) of the Code of Criminal Procedure and powers of Collector under section 3 (C) of Land Acquisition (Mines) Act of 1885. The Deputy Commissioner of Manbhum Mr. Hignall in his letter no. 591, dated 25th February, 1915, to the Commissioner opposed the idea of separate Additional Deputy Commissioner at Dhanbad and recommended one for the whole of Manbhum, observing, "As the Dhanbad subdivision is in every respect the most important part of the Deputy Commissioner's charge, it would be incongruous to give the Additional Deputy Commissioner charge of it and restrict the Deputy Commissioner to the less important part of the district." The Jharia Water Board on the other hand, requested the Government by their Resolution of the 24th January 1916 to place an officer on special duty at Dhanbad for the next four years to serve as Chairman of both the Water Board and the Board of Health. The Commissioner of Chhotanagpur Mr. H. T. S. Forrest discussed the question at certain length in his letter to the Government no. 957-R., dated 29 March, 1916 and recommended the appointment of an Additional Deputy Commissioner at Dhanbad, basing his arguments on four important grounds, firstly, that the Subdivisional Officer was over-worked; secondly, that there were frequent changes in the post of Subdivisional Officer; thirdly, that the colliery people were in many ways inconvenienced, having to apply to Purulia for their petrol, dynamite and motorcar licences, birth certificates, etc.; and fourthly, that the work of the two Coalfield Boards was hampered by the necessity of making frequent references to the Chairman at Purulia. He proposed the following duties which the Additional Deputy Commissioner should perform:—

- "(1) Exercise the ordinary powers of a District Magistrate as specified in Schedule III of the Criminal Procedure Code.
- (2) Be empowered to hear appeals under the Tenancy Act.
- (3) Be given the powers of a District Magistrate under the Arms and Explosives Act, Petroleum Act, Motor Vehicles Act and Village Police Act.
- (4—7) Be appointed Chairman of the Jharia Water Board and Jharia Mines Board of Health and Member of the Mining Board of Bihar and Orissa.
- (8) Exercise the full powers of a Collector under the Land Acquisition Act."

The State Government who had already been considering the matter, decided as an experimental measure, to appoint Mr. T. Luby,

the Subdivisional Officer of Dhanbad to be also Additional District Magistrate of Manbhum and created for this purpose a temporary appointment in the third grade of Magistrate and Collector for a period of six months with effect from the 31st March 1916, vide letter no. 1720-A, dated the 7th April 1916, to A. G. and notification no. 1725-A of the same date. By subsequent notifications the Additional District Magistrate was gradually authorised to perform all the functions recommended in Mr. Forrest's letter of 29th March, of course, after obtaining the sanction of Government of India where it was necessary as in the case of Arms Act and Explosives and Petroleum Acts. The designation of the post as notified was to be Additional District Magistrate as the term 'Additional Deputy Commissioner' was till then unknown to the Cr. P. C. under the provisions of which the appointment had been made. The notification no. 7369-M, dated 1st June 1916, which conferred upon him the powers under Indian Motor Vehicles Act, however, designated the conferee as the Additional Deputy Commissioner of Manbhum.

The term of appointment was limited to a period of six months but could be extended thereafter if the arrangement proved satisfactory. The appointment was accordingly renewed hereafter every six months on recommendation from the Commissioner. In their letter no. 1265-A, dated 19 March, 1917, the State Government asked the Commissioner to report by the 1st September 1917 how the arrangement had worked, and, on the latter's reporting that it had worked entirely satisfactorily, decided to take steps for the permanent sanction of the measure. They accordingly wrote to Government of India in their letter no. 4955-A, dated the 9th October 1917, to move the Secretary of State to sanction the addition of one post of Magistrate and Collector, third grade, to the cadre of the Indian Civil Service in Bihar and Orissa for the Additional Magistrate at Dhanbad with effect from the 1st October 1918, the date on which the Local Government's power of sanction to the temporary appointment expires. The Governor General permitted the continuation of existing arrangement till the sanction of the Secretary of State was obtained and requested the latter to accord sanction to the proposal, vide despatch no. 35 of the 23rd February 1918. The Secretary of State's sanction (vide his despatch for India no. 52-Public of 28th June, 1918) was received on the 27th August, 1918, and from that date the appointment of Additional Deputy Commissioner was rendered permanent as per memo nos. 3315-A and 3316-A, dated the 7th October 1918.

The later history of Dhanbad is more or less the administrative history of Manbhum district to which she was attached now as a sub-district. For all purposes the Additional Deputy Commissioner of Dhanbad was the Deputy Commissioner of the area and it is only for certain revenue purposes that Dhanbad had links with

Manbhum district. The Deputy Commissioner of Manbhum at one time used to inspect the office of the Additional Deputy Commissioner of Dhanbad but with the growth of the sub-district of Dhanbad and the building up of an exclusive prestige of the Additional Deputy Commissioner, this prerogative of the Deputy Commissioner of Purulia was reduced to a mere convention.

Dhanbad continued as a part of Manbhum district from 1833 to 31st October 1956. The States Reorganisation Commission had visited Manbhum district and there were suggestions and counter-suggestions as to whether portions should go to West Bengal or not. With the decision of the States Reorganisation Commission that the main portion of the Sadar subdivision of Manbhum district should go to West Bengal, two *thanas* of the Sadar subdivision Chas and Chandankeari came over to Dhanbad sub-district and the status of Dhanbad was upgraded into a full-fledged district. It may be mentioned here that another small portion of Manbhum Sadar subdivision went over to Singbhum district in Bihar as well.

Dhanbad district has now got two subdivisions—Dhanbad and Baghmara. Three *thanas*, namely, Topchanchi, Baghmara and Katras were excluded from the Dhanbad subdivision and were added to the newly created subdivision of Baghmara which was also given Chas and Chandankeari areas. As the official quarters at Baghmara are not yet ready (1962) the Subdivisional Officer of Baghmara continues to stay at Dhanbad.

Dhanbad district and particularly the colliery area is now a cosmopolitan zone inhabited by people from all parts of India who carry on collieries and other industries, various kinds of trades and professions in private and public sectors. The industrial potential of the district has been discussed elsewhere. Dhanbad is one of the most important districts in India and has one of the largest colliery belt in the world.

FREEDOM MOVEMENT.

Dhanbad.

Dhanbad as a part of the old Manbhum district had participated in the *Swadeshi* movement of the first decade of the 20th century. The development of the collieries and the progress of trade-unionism had been remarkable in this district and brought about a local touch in the struggle for freedom.

When Mahatma Gandhi with the help of the other leaders sponsored the Non-Co-operation Movement on an all-India basis, Dhanbad as a part of Manbhum district offered co-operation. In August, 1920 a widely attended provincial conference was held at Bhagalpur in which a large number of people from Dhanbad took

active part. The conference passed the resolution of Non-co-operation. In September, 1920 a session of the Indian National Congress was held at Calcutta in which a resolution was passed for starting the Non-co-operation Movement throughout India under the leadership of Mahatma Gandhi.

With the starting of Non-co-operation Movement in 1920 Dhanbad district saw intense political activities. During 1921 Dhanbad was visited by Shri Rajendra Prasad, Mazharul Haque, Swami Vishwanand, Pandit Motilal Nehru and others. The early Congress leaders appreciated the necessity of organising the coalfield areas and also to tap the rich industrialists and colliery owners of Dhanbad area for the Congress fund. Pandit Motilal Nehru paid a hurried visit to the coalfield areas on the 21st March, 1921 and addressed largely attended meetings at Dhanbad and Jharia.

The stir that was created went on unabated and the arrest of Muhammad Ali and Saukat Ali, Kitchlew and others in the month of September due to the passing of the resolution of the *Khilafat* Conference in Karachi which in the opinion of the Government sought to tamper with the loyalty of the soldiers had its aftermath in Dhanbad district as well. Gandhiji intensified the campaign and hundreds of meetings began to be held in every district where the Karachi resolution was repeated word by word. There were similar meetings in Dhanbad district as well.

The Temperance movement was, however tried in Dhanbad district with little success. The colliery workers and the industrial labour had found a cheap recreation in drinking and it was difficult to wean them away from the habit. On the 29th November, 1921 the resignation of Lord Sinha, the first Indian Governor of Bihar was accepted. The news of the resignation of Lord Sinha was received in the countryside with a good deal of misgivings. By the end of 1921 and almost immediately after the resignation of Lord Sinha there was a widely ramified arrest of leaders and records of Congress offices were seized. In this process, Dhanbad was no exception.

The Trade Union movement in Dhanbad has been described elsewhere. It was at Dhanbad that Shri Jawaharlal Nehru received his first schooling in trade-unionism. Without a militant trade-unionism and a vigilant industrial force the bid for freedom would not have been successful in this district.

The first Manbhum Political Conference was held in 1929 at Ramchandrapur village with Shri Subhas Chandra Bose as its President and the second Conference at Jhalda on April, 1929 with Shri J. M. Sen Gupta as its President. Both these Conferences were largely attended by people of Dhanbad. A strong political group had already formed with leaders of advanced national views in Purulia with Shri Nibaran Chandra Das Gupta, Editor of *Mukti*,

a widely circulated Bengali weekly. This group ultimately came to be known as the *Lok Sewak Sangh* and wielded considerable influence on the politics of Manbhum district. Shri Nibaran Chandra Das Gupta was sentenced to simple imprisonment on the 3rd March, 1929. This imprisonment of Das Gupta added to the political agitation in Manbhum district which included Dhanbad.

The third Manbhum Political Conference was held in 1930 at Dhanbad. The President elect was Dr. Rajendra Prasad who, however, could not turn up being busy in *Satyagraha* at Patna. Shri Nibaran Chandra Das Gupta presided. Salt *Satyagraha* began in Manbhum in right earnest and contraband salt used to be sold openly in the markets. The Manbhum District *Satyagraha* Committee was declared to be an unlawful association and a number of Manbhum congressmen, viz., Bibhuti Bhusan Das Gupta, Sheo Saran Jaiswal, Mohan Das Babaji, Bir Raghobacharya, Editor of the *Mukti* and others were arrested. Dhanbad was naturally much agitated over all this.

The students of the district were imbued with the spirit of new patriotism and hundreds of them deserted the schools and colleges and a National School was established at Jharia. Political leaders from other parts of Bihar and Bengal often visited this area. Many of the hostel students also participated in the strike. The Headmaster of Jharia Raj School was compelled to take action against the leading students of the hostel and they were served with notice to vacate the hostels. Shri Shyam Prasad Singh, Shri Ramchandra Mukherjee, Shri Rangalal Choudhury and others took part in the students' movement. This continued for several days and at last the police arrested some of the students as well as other leaders, namely, Shri P. C. Bose, a labour leader at that time and Shib Kali Bose. In Topchanchi and other areas Shri Baikunth Nath Choudhury and others hurried themselves in organising and mobilising the rural areas by holding meetings, processions, etc., in support of the movement and picketings were often made before the liquor shops at Jharia and Katras and even in the rural areas such as Chirkunda, Govindpur and Topchanchi. Mass arrests were made and the people were much agitated, Shri P. C. Bose was arrested and brought to Dhanbad sub-jail and thus intensified the agitation.

In 1930 the Civil Disobedience Movement gained a new momentum in the district. The Government took stern measures against it. Meetings and procession were forcibly dispersed. Congress leaders were bound down under various sections of the Indian Penal Code. A number of leading congressmen were convicted.

Later political events and their impact on Dhanbad district were almost on the same pattern as in the other districts, the story of which has been covered at some length in Monghyr and other District Gazetteers. It is necessary here only to refer to the fact

that the organisation of labour and trade-unionism received a great encouragement as a direct impact of the Congress and Non-Co-operation Movement. Throughout Bihar there were 11 labour strikes in 1937-38 and more in the next year. Strikes had taken place at various industrial centres, viz., at Kumardubhi, Dhanbad, Katras, Modidihi, Chanch in Dhanbad district. The colliery labourers and the industrial workers in the industrial units were getting organised. Mr. Manik Homi of Jamshedpur succeeded in getting his Labour Federation registered but he was opposing Prof. Abdul Bari in his negotiations for the successful settlement of the strikes. Prof. Abdul Bari identified himself with the cause of labour and the first organisation of Tata Workers' Union had its ramifications in Dhanbad district as well. The colliery labourers and the labourers in the other units were extremely excited in 1937-38 and its excitement was canalised and given a shape by Prof. Abdul Bari and others.

The political picture of Dhanbad in 1942-43 starts with the organisation of the National War Front at the instance of Bihar Provincial War Committee which was organised by the British bureaucracy to counteract much of the activities of the Congress. The idea was that the National War Front would try to evoke popular support to fight out the menace of war and the evils it produced. But the National War Front like similar other movements had flopped although there might have been a certain amount of success in localised areas due to the influence of some particular individuals. An example may be given that in May, 1942 a big meeting of 1,500 persons at Dhanbad listened to the speech of the provincial and other local leaders of National War Front Movement and they dispersed with the shouts of "Gandhiji ki Jai"!

The resolution of the Working Committee of the Congress at Wardha on the 6th of July, 1942 passing the Quit India Movement which was placed before the next meeting of the All-India Congress Committee at Bombay stiffened the attitude of the Government of India and the Provincial Government of Bihar. Armed with a series of Ordinances and new legislations, the Government of Bihar took a decision that they could not allow the situation to deteriorate any further. Active preparations were made for taking concrete steps to suppress the new movement and steps were taken for the arrest of the leaders. A tentative list with classification of prisoners and even the locations of their confinement were drawn up. Before the meeting of the All-India Congress Committee began, Dr. Rajendra Prasad took necessary steps to acquaint the people of Bihar with the contents and significance of the Wardha resolution and to sound their views on it. Dr. Rajendra Prasad was ill at that time and he had to remain at Patna due to his illness. The leaders of the Province had also drawn up a tentative draft programme and had planned a *satyagraha*. In a meeting which was addressed by

Dr. Anugraha Narain Sinha at the Anjuman Islamia Hall in Patna, the students were asked to prepare themselves for the coming struggle. The situation was literally electrified and only needed a spark for an explosion.

The Quit India resolution was considered at the historic sessions of All-India Congress Committee at Bombay on the 6th and 7th of August, 1942 and was passed with an overwhelming majority and on the early hours of morning of the 9th August Gandhiji and members of the Congress Working Committee were arrested. Numerous arrests at various places all over the country followed quickly on that day. At Patna Dr. Rajendra Prasad was arrested and taken to Bankipore Jail along with other persons. Dr. Sri Krishna Sinha was arrested on the 10th of August while Shri Anugraha Narain Sinha was arrested on the next day. Ordinance rule was at once inaugurated by the Government and in an extraordinary issue of *Bihar Gazette* published on the 9th August, the State Government issued notifications declaring a large number of Committees and Associations as unlawful. As a reaction there were widespread upheavals throughout the Province and Dhanbad was no exception. In Dhanbad area including Jharia and Katras there were *hartals*, strikes, meetings and processions. *Shilpa Ashram* of Purulia which was the centre of the activities of Shri Nibaran Chandra Das Gupta, Bibhuti Bhushan Da Gupta, President of the Manbhum Pradesh Congress Committee was raided on the 10th of August and the *Ashram* was seized. A large number of persons including the wife and the daughter of Atul Chandra Ghosh were arrested and confined in jail. On his return from Bombay Atul Chandra Ghosh was also arrested. But these arrests gave occasion for further excitement. The movement became militant and a section went underground. Throughout Purulia and Manbhum, handwritten and cyclostyled leaflets were distributed asking the people to rise equally to the occasion. At Jharia an attempt was made on the 14th August to recover the Congress Office which Government had seized on the 10th August. The Police forcibly dispersed them after arresting some. In the evening, the Police helped by an armed force prevented the entry of the people into the police station and the Police Office to hoist the National Flag and arrested the leader. After holding a meeting there the crowd went to Modidih colliery and telephone lines at Panchghari bazar and Katri bridge were cut that day. A large crowd tried to raid Katras railway station on the 16th August. The Police had to open fire to stop the raiders and there were some casualties. The local A. F. I. and E. I. R. regiments were posted to Dhanbad and Gomoh railway stations. The labour population in coalfields were agitated and there were sporadic outbursts in various parts of Dhanbad district which had to be put down with brute force. The sections that had gone underground created a lot of confusion, hold-up, blockade of trains, etc.

The students' procession at Dhanbad on the 17th August, 1942 was broken up by arrest and *lathi* assault. A detachment of 20 British anti-aircraft gunners under Capt. Elis was sent from Asansol and reached Dhanbad at about 6 P.M. On the same afternoon after a meeting held in the Congress Office at Jharia there was a certain amount of lawlessness and a large number of people started moving about in a militant mood cutting telegraph wires and setting fire to the Jharia Post Office and Jharia railway station. The Additional Superintendent of Police with the help of the detachment of Capt. Elis arrested 10 persons. Early next morning orders were promulgated prohibiting the assemblage of more than five persons in public places and imposing curfew between 6 P.M. and 5 A.M. in Dhanbad, Jharia and Katras areas. A company of Black-Watch Regiment consisting of four officers and 100 men were subsequently brought and deployed at Dhanbad. Military rule without a formal declaration had taken over. It is, however, fortunate that the open lawlessness in Dhanbad district was not allowed to reach that unfortunate incidence which we find in certain other districts in Bihar and was controlled with the help of the military and armed police.

Towards the end of 1943 the movement gradually abated and the Congress took up a constructive policy. The Government also gradually relaxed their repressive measures. In June, 1945 Mahatma Gandhi and the members of the Congress Executive Committee were let off. The Second World War came to an end. In the month of September the Government removed the ban on the Congress. Political prisoners were released. The top leaders of this district started a constructive programme with its headquarters at Purulia in 1943. Khadi Industries, paper making, soap-making industries were started at Purulia, Hoorra, Pancha and in Dhanbad. The political trends were of the same type all over the State.

At the beginning of 1946 elections to the both Central and Provincial Assemblies were held. In the Bihar Assembly the late Shri P. C. Bose who had taken a lot of interest in labour movement and the late Purusottam Chauhan were elected as members. A Congress Ministry was formed again in Bihar and Sri Krishna Sinha was elected the leader and became the Chief Minister of Bihar. On the 15th August, 1947 India secured her freedom and the same day everywhere in India Independence Day was celebrated. The people of Dhanbad participated in the celebration amongst great joy and nostalgic memories.

IMPACT OF STATES REORGANISATION COMMISSION ON DHANBAD DISTRICT.

On 22nd December, 1953, the Prime Minister of India made a statement in Parliament to the effect that a Commission would be appointed to examine objectively and dispassionately the question of the reorganisation of the States of the Indian Union so that the welfare of the people of each constituent unit as well as the nation

as a whole is promoted. This was followed by the appointment of the States Re-organisation Commission under the Resolution of the Government of India in the Ministry of Home Affairs, no. 53[69]53-Public, dated the 29th December, 1953.

The Commission consisted of three members, viz., Sardar Kavalam Madhava Panikkar, Shri Hriday Nath Kunzru and Shri Saiyid Fazl Ali. Shri Saiyid Fazl Ali was the Chairman of the Commission but owing to his long connection with Bihar he had refrained from taking any part in investigating and deciding the territorial disputes between Bihar and West Bengal and Bihar and Orissa.

The Commission received one memoranda each from the Governments of West Bengal, Orissa and Bihar regarding the problem of the re-distribution of certain tracts of West Bengal, Bihar and Orissa. Besides the memoranda from the Governments, there were also memoranda by public bodies and a number of associations. The Pradesh Congress Committees were also heard by the Commission. The Commission visited Dhanbad on 4th/5th February, 1955 and Purulia on the 5th/6th February, 1955. The Commission took evidence of a large number of persons in Dhanbad and other places. On the 5th February, 1955, the Commission took the evidence of a number of members of the Legislative Assemblies, members of the Parliament, members of the Subdivisional Congress Committee, the delegations of the local bodies, a few members of the Dhanbad Bar, some Communists and a representative of the Jharkhand party. A few persons representing Bihar Association had also appeared before the Commission.

It will be correct to state that local feelings were very much stirred up on the question of the re-distribution of certain parts of Manbhum district.

The background will appear from the following lines from paragraph 26 of Chapter III of the Memorandum submitted by the Bihar Government:—

“One or two memorials were no doubt submitted to the Government of India by a few Bengali landholders of the Santhal Parganas, Manbhum, etc., and pleaders of Manbhum and Dhalbhum, in association with some British colliery-owners, also submitted memoranda for retaining these two areas within the Province of Bengal as it suited their interests best. But there was no popular desire, much less an agitation to back up the memorials. Even so, the memorials were examined carefully, and the Government of India did not find any justification for making any change in the boundaries between Bihar and Orissa and Bengal on any ground whatsoever.”

It is not necessary here to enter into the various controversies that had been raised on this issue. The Manbhum District Congress Committee with its President Shri Atul Chandra Ghosh had taken up the question in 1948 and a resolution on the matter suggesting merger into Bengal moved by the President Shri Atul Chandra Ghosh was defeated by a large majority of votes. As the resolution was moved from the Chair, the verdict of the Committee was really a vote of no-confidence in the President. Shri Atul Chandra Ghosh and his supporters resigned and they formed a separate association known as *Lok Sevak Sangh* which went on agitating for the transfer of the district of Manbhum to West Bengal. The Bihar Legislature had considered the demand and rejected it.

The terms of reference to the States Reorganisation were very wide and the task was set out in paragraph 7 of the Resolution of the Government of India in the following terms:—

“The Commission will investigate the conditions of the problem, historical background, the existing situation and the bearing of all important and relevant factors thereon. They will be free to consider any proposal relating to such reorganisation. The Government expect that the Commission would, in the first instance, not go into the details but make recommendations in regard to the broad principles which should govern the solution of this problem and, if they so choose, the broad lines on which particular States should be reorganised and submit interim reports for the consideration of Government.”

The State Government of Bihar gave various reasonings to show that Manbhum was ethnologically, culturally and socially an integral part of Bihar and not of West Bengal and opposed any merger. It is not necessary to go into the claims made by the State Government of Bihar or the State Government of Bengal or into the various memoranda and memorials that had been presented to the Commission.

The States Reorganisation Commission submitted their report in 1955 and the portion regarding Manbhum district runs as follows* :—

“Manbhum is really composed of two different areas which are divided by the Damodar. These areas are now treated as two sub-districts, but with a population of 732,000 and 1,548,000 respectively, they are for practical purposes separate districts and are administered as such. Dhanbad which is the industrialised area, in which Hindi is predominant, differs from Purulia

* Report of the States Re-organisation Commission, 1955, pages 178 to 180.

which is comparatively less industrialised, and has a much greater concentration of the Bengali-speaking people.

There is no case for the transfer of Dhanbad to West Bengal. The Hindi-speaking majority in this sub-district is 65 per cent. Coalfields along the course of the Damodar river and the D. V. C. industrial belt are situated mostly in this sub-district and there are indications that Dhanbad like Jamshedpur, may soon attract a mixed population from all over India as it is further developed. The West Bengal claim to this area is, therefore, untenable.

In Purulia on the other hand, there is unmistakable evidence of Bengali influence even today. This sub-district has the largest concentration of Bengali-speaking people outside West Bengal.

The transfer of Purulia can be justified on the ground that it will facilitate the implementation of a flood control-cum-irrigation project which has recently been taken up in West Bengal. The Kansabati (Kasai) river, which rises in Purulia, is of no real importance from the point of view of Bihar but West Bengal has already utilised it to some extent in its lower reaches, and now proposes to build a dam on this river near the Bihar border.

If flood control and irrigation in the Burdwan division are to be efficiently carried out in future, it will be desirable to transfer to West Bengal a major portion of the catchment area because this will facilitate soil conservation measures and also provide perhaps a more appropriate dam site.

The importance of the Kasai to West Bengal will be apparent from the fact that it is supposed to derive its name "the butcher" from the annual devastation which its flood waters cause in and round Midnapore. This may not be a conclusive argument justifying the proposed transfer. But in this case, as in the case of Bellary the other arguments are either unimportant or are more or less balanced; in these circumstances, it cannot be regarded as a minor question that the implementation of a project to which West Bengal attaches considerable importance will be helped by the transfer.

It has been claimed by West Bengal that the linguistic tabulation of the 1951 census cannot be regarded as satisfactory and that if we disregard the census of 1951 and take into account the two previous censuses at

which linguistic distribution of the people was recorded, the Bengali-speaking percentage was of the order of two-thirds of the total population in the entire district; in Purulia, which as has already been stated has even today a considerable population speaking the Bengali language, it was perhaps more impressive.

We do not feel called upon to enter into the controversies relating to the figures of the preceding censuses. We must, however, take note of the fact that even according to 1951 census, the Bengali-speaking majority in the rural areas of Purulia will be about 55 per cent (as against 28 per cent of the Hindi-speaking people) if the Chas revenue *thana*, which is contiguous to Dhanbad is excluded.

Considering the circumstances referred to above in which the West Bengal claim to Manbhum has been made, it was proposed that the Purulia sub-district excluding the Chas *thana*, should be transferred to West Bengal. Such a transfer will not seriously upset either the economy or the administrative structure of Bihar, but will, on a balance of considerations, be justified. It may be pointed out incidentally that since the area proposed to be transferred is virtually a district, the initial inconvenience, if any, as a result of the transfer will be negligible."

The final decision of Government of India was contained in Clause (b) of sub-section I of section I of the Bihar and West Bengal (Transfer of Territories) Act, 1956, according to which the areas comprising in Purulia subdivision of Manbhum district, excluding Chas *thana*, Chandil *thana*, and the Patamda police station of Barabhum *thana* were transferred.

Chas and Chandankeari Police *thanas* were tagged on to Dhanbad district which was formed into a separate district in October, 1956.

According to 1951 census the areas and population of Chas, Chandankeari and Patamda are as follows:—

Thana.	Sq. miles	Population.
Chas	278	64,377
Chandankeary	143	81,178
Total added to Dhanbad	421	1,45,555
Patamda	310	64,377
(added to Singhbhum district).		

According to this the area of the new Dhanbad district comes to 1,114 sq. miles.

As a matter of administrative exigency a new subdivision Baghmara was created. The district now constitutes the following subdivisions:—

Dhanbad Sadar subdivision with headquarters at Dhanbad, comprising the local areas included in the police stations of Govindpur, Kenduadih, Dhanbad, Balia-pur, Jorapokhar, Jogta, Sindri, Nirsa, Chirkunda and Tundi; and

Baghmara subdivision with temporary headquarters at Dhanbad comprising with local areas included in the police stations of Chas, Chandankeari, Topchanchi, Baghmara and Katras.

A site for the headquarters of Baghmara subdivision has been selected at Baghmara for the construction of the Government buildings necessary for the subdivisional headquarters. The site has not yet been finalised. The Subdivisional Officer of Baghmara has now his headquarters at Dhanbad.

It may, however, be mentioned that even if the States Reorganisation Commission had not been constituted and the recommendations implemented, there is no doubt that before long Dhanbad would have been raised to the status of an independent district. Even as a sub-district Dhanbad had a special status and the Additional Deputy Commissioner was treated almost for all purposes as District Officer and he could communicate direct with the Commissioner of Chotanagpur and the Government headquarters at Patna. The immense industrial potentialities in Dhanbad sub-district had already started developing and the inferior status of a sub-district was quite an anomaly. Dhanbad is now one of the most progressive districts in India and because of her deposits of coal-suphemistically called black diamond, it is well known throughout the world.

CHAPTER III.

PEOPLE.

The present population structure of Dhanbad has followed in a way the administrative evolution of the district. It may be repeated here that the present shape of the subdivision was given in 1871 when Shergarh with a part of Pandra (portion on the east of Barakar river) was transferred to Burdwan. The subdivisional headquarters continued to be at Govindpur on the Grand Trunk Road till July, 1908. The subdivision consisted of Pandra, Tundi, Nagarkhari, Jainagar, Katras, Nawagarh and Jharia *parganas*. The subdivision was given the status of a sub-district in 1927 and that of a district in 1956 with some additions.

This portion has an ancient past full of traditions and forms a confluence of Brahmanical Hinduism, Buddhism and Jainism. The ruins of the temples at Chechaongarh, Katras, Jharia, Palganj, etc., are suggestive. The very early history of the district is lost in oblivion and the theories of Beglar, Dalton and others referred to in the old *District Gazetteer of Manbhum* deal mainly with the then Sadar subdivision of the district of Manbhum which is now Purulia district in West Bengal. Even the quotations from the *Bhavisyay Puran*, *Ain-i-Akbari* or *Padeshahnama* give very little help in tracing the early history. But we can make some intelligent cases from the relics and particularly because of the trans-district route which ultimately became the Grand Trunk Road. There is no doubt that this has been the main route for the movement of forces and as such people inhabiting the subdivision had to lead an orderly and rather unambitious life.

As mentioned in the old Gazetteer the disputes between the zamindars and tenants in Tundi in 1869-70 were quickly settled, so also the trouble caused by the zamindars of Nawagarh and Jharia in November, 1882. By nature the people are satisfied with bare necessities of life and they used to do a little scratching of the earth, grow some crops or get a few baskets full of coal which were quite sufficient for their livelihood. The development of the collieries quickly threw open the gates of immigration and the result was that very quickly most of the collieries were lost to the hands of outsiders and so also trade and commerce. It is rather significant that most of the collieries have been worked by lease-holders from the zamindars and very few zamindars worried to work the collieries themselves. Emigration naturally declined and the incidence of immigration went up very high and this tempo of immigration is still continuing.

The conversion of the subdivision into sub-district raised the administrative importance of the unit which was further accelerated when Dhanbad was created into a full fledged district. As a result

of the implementation of the States Reorganisation Commission when most of the Sadar subdivision of Manbhum was transferred to West Bengal, Dhanbad had a further accretion by the addition of Chas and Chandankeary *thanas*.

According to the *Census Report of 1951* the population of Dhanbad sub-district was 7,31,700 distributed as follows:—

Name of Revenue <i>thanas</i> ,	Area of Revenue <i>thanas</i> in square miles.	Name of police-stations.	Population of police-stations according to Census, 1951.
(1) Govindpur ..	118	(1) Govindpur ..	64,648
(2) Jharia ..	171	(2) Jharia ..	80,527
(3) Topchanchi ..	173	(3) Jorapokhar ..	58,885
(4) Nirsa ..	173	(4) Sindri ..	14,693
(5) Tundi ..	152	(5) Dhanbad ..	49,870
		(6) Kenduadih ..	50,842
		(7) Jogta ..	37,072
		(8) Bahapur ..	42,882
		(9) Nirsa ..	79,840
		(10) Chirkunda ..	42,048
		(11) Tundi ..	50,319
		(12) Topchanchi ..	45,744
		(13) Baghmara ..	50,024
		(14) Katras ..	64,297

The statement above shows that in the ascending order of the density of population the *thanas* will be arranged as Tundi, Govindpur, Nirsa, Topchanchi and Jharia. Of these five *thanas*, Tundi and Govindpur are purely rural areas having very little attraction in them for immigration, but the latter is more densely populated than the former. One of the causes of the greater density of population in Govindpur is that it has more lands for cultivation than Tundi, a considerable portion of which is occupied by hills and jungles. Another probable cause is that while Govindpur immediately adjoins the industrial area, Tundi is at a distance from it with the result that the workers in industrial area, coming from Govindpur have in very rare cases, to reside in industrial area and those coming from Tundi have in all cases to leave their places of residence and live there. Thus it is found that the growth of population in Govindpur *thana* is more natural than all other *thanas* of the sub-division. It has been least affected either by migration or by natural advantages and disadvantages. It is very difficult to ascertain

the number of present immigrants of the subdivision but an approximate number, at any rate, can be obtained by taking the density of population of Govindpur *thana*, the natural density (i.e. 542 persons per sq. mile) of the subdivision and the excess of population over this density, the approximate number of immigrants. According to this formula the number of immigrants including the displaced persons till 1951 works out to be 33,641, i.e., 29,433 or $(714-542) \times 171.15$ in Nirsa *thana*, 76,839 or $(914-542) \times 187.87$ in Topchanchi *thana* and 2,30,364 or $(2000-542) \times 158$ in Jharia *thana*. If the above figures are taken to be correct about 46 per cent of the subdivision population is immigrants. The main occupation of the people are to cultivate the land and to work in the colliery. They are generally very contented class of people and so long as they have anything at home to meet their bare necessities of life they will not go out for any work, other than cultivation. This is because the people depend more on nature for irrigation and they never lose any chance of cultivating the land.

DISPLACED PERSONS.

The partition of the country in 1947, led to a substantial percentage of the Hindus of East Pakistan and West Pakistan to come to the States of India including the State of Bihar. The influx of displaced persons was very rapid which was caused due to communal tension which kept aflame in Eastern and Western Pakistan. The magnitude of the problem which the Government of India had to bear was almost unprecedented in human history. The Government of India tried to solve this unprecedented problem and made a request to all the States of the Indian Union to share the responsibility to rehabilitate the displaced persons. Like all other districts, displaced persons both from East and West Pakistan started coming to Dhanbad district.

According to the census of 1951 (*Census of India*, Volume V, Bihar, Part II, pages 337-338) the total number of displaced persons in Dhanbad was 7,257. Out of it 4,307 were males and 2,950 females.

The break-up figures were as follows:—

Displaced persons from West Pakistan.

Years.	Males.	Females.	Total.
1946	37	24	61
1947	530	570	1,100
1948	174	165	339
1949	50	6	56
1950	45	27	72
1951	..	..	..

Displaced persons from East Pakistan.

Years.	Males.	Females.	Total.
1946	458	125	583
1947	1,639	1,247	2,886
1948	840	393	1,233
1949	218	173	391
1950	311	219	530
1951	5	1	6

For the re-settlement of these displaced persons, sixty stalls have been constructed at Jorapokhar and Dhanbad. But these displaced persons are not willing to occupy these stalls. No residential building has been constructed for them by Government in the district, but financial assistance was made available to them for the construction of building.

All these persons have been advanced loans for construction of residential building as well as to start business. A total sum of Rs. 1,86,017.62 nP. was advanced as loan from 1948 to 1958 to these displaced persons as supplied by Relief Section, Dhanbad.

The table supplied by Relief Section, Dhanbad given below shows the amount of loans advanced to the families of Dhanbad and Jorapokhar in the two financial years, i.e., 1959-60 to 1960-61:—

Year.		House building loan.	Business loan.
		Rs.	Rs.
1959-60	.. ..	30,934.00	63,012.37
1960-61	.. ..	45,290.00	46,781.25

MIGRATION.

The incidence of migration is particular feature of the districts in Chotanagpur. Along with the men of the other districts of Chotanagpur the aboriginals of Dhanbad district also emigrate frequently. The emigration is of several types. In the cold weather the aboriginals emigrate for periodical employment. The emigration to the coalfields is of a more permanent nature. In the past whenever there has been scarcity the incidence of emigration has gone up.

According to the *Census Handbook of 1951* (pages 78-79), in Dhanbad out of the total population of 7,31,700 there was a population of 2,18,381 born outside Dhanbad and found within the district

when the census operations took place. This population of 2,18,381 is distributed as follows according to their birth places:—

	Persons.	Males.	Females.
Patna Division	46,414	30,000	16,414
Tirhut Division	7,289	4,294	2,995
Bhagalpur Division	41,313	23,120	18,193
Chotanagpur Division (excluding Purulia and Dhanbad).	51,062	30,487	21,465
States adjacent to Bihar	46,816	31,578	15,238
Other States in India	6,327	3,454	2,873
Countries in Asia other than India	19,070	11,806	7,264
Countries in Europe	78	34	44
Africa	5	3	2
America	14	9	5
Australia	3	2	1
Total	2,18,381	1,34,787	83,594

An exclusive feature of the population of this district is the presence of a very sizable cosmopolitan population in the urban areas. This is due to the rapid industrialisation of the district which has attracted skilled hands from various parts of the world. The technological experience of several nations has been made available to the industrial units in this region. Initially Sindri had attracted experts from foreign countries in connection with the expansion of the industries. Apart from the presence of people from different parts of the world, Sindri and Jharua and some of the other industrial areas could well be described as a museum of the different areas in India. There is hardly any part of India from where men have not come to Dhanbad to earn their bread. This unique cosmopolitan feature is a great social factor and it may be said that the different classes of people from different parts of India have been living peacefully.

It may also be observed that this district occupies a very prominent position in India's coal belt. With the passage of time the importance of Dhanbad district in this area is bound to increase.

Practically many of the basic minerals are found in this area and with the expansion of communication, improvement of technical skill and its availability, the area will be developed much

more and this integrated industrial region will have a world importance. The cosmopolitan character of the urban population of Dhanbad is also expected to continue.

GROWTH OF TOWNS.

In 1901 Dhanbad had two towns, viz., Dhanbad and Jharia. In 1951 one more town, viz., Sindri was added to this district. In 1961 there are nineteen towns in total. It has to be mentioned here that the concept of a town till 1951 was the population of 5,000 persons and above. In 1961 a different criterion has been fixed, i.e., only place with the population of more than 5,000 persons, the density of more than 1,000 persons per square mile and if at least 75 per cent of adult male population in non-agricultural occupations, fulfil the conditions of being a town.

The table given below gives the list of all towns in the district with the population figures from 1901 to 1961*:-

Town.	Persons.	Variation.	Males.	Variation.	Females.	Variation.
1	2	3	4	5	6	7
1. Dhanbad—						
1901
1911
1921	..	12,951	..	8,068	..	4,883
1931	..	16,356	+3,405	9,882	+1,814	6,474
1941	..	21,411	+5,055	12,968	+3,076	8,474
1951	..	34,077	+12,666	20,661	+7,703	13,416
1961	..	57,473	+23,396	35,081	+14,420	22,392
2. Jharia—						
1901
1911
1921
1931
1941	..	18,037	..	10,717	..	7,320
1951	..	26,480	+8,443	15,689	+4,972	10,791
1961	..	33,805	+7,325	19,085	+3,996	14,120
3. Sindri—						
1951	..	13,045	..	8,760	..	4,285
1961	..	41,349	+28,304	24,852	+16,092	16,497

* The 1961 figures are provisional as published by the Superintendent of Census Operations. The final figures were not published when the text was compiled and are not expected to vary much. (P. C. R. C.)

Town.		Persons.	Variation.	Males.	Variation.	Females.	Variation.
1		2	3	4	5	6	7
4 Chirkunda—							
1961	..	9,485	..	5,431	..	4,054	..
5. Kumardhubi—							
1961	..	10,551	..	9,870	..	6,681	..
6. Panchot—							
1961	..	4,703	..	2,758	..	1,945	..
7. Maithan—							
1961	..	8,039	..	4,706	..	3,243	..
8. Tisra—							
1961	..	7,477	..	4,794	..	2,683	..
9. Angar Pathar—							
1961	..	6,003	..	4,018	..	1,985	..
10. Katras—							
1961	..	17,244	..	9,858	..	7,386	..
11. Korkend—							
1961	..	6,507	..	4,012	..	2,495	..
12. Gomoh—							
1961	..	12,097	..	6,873	..	5,224	..
13. Loyabad—							
1961	..	11,546	..	7,932	..	3,013	..
14. Sijua—							
1961	..	10,051	..	6,191	..	3,860	..
15. Jamadoba—							
1961	..	6,582	..	4,040	..	2,533	..
16. Bhawrah—							
1961	..	10,557	..	6,583	..	3,974	..
17. Jorapokhar—							
1961	..	15,613	..	9,822	..	5,791	..
18. Dumarkunda—							
1961	..	8,693	..	5,425	..	3,268	..
19. Chaitudih—							
1961	..	6,561	..	4,450	..	2,111	..

The reasons for the increase in urban population are quite a few. There has been a somewhat drift of the population towards the town. This is partially due to abolition of zamindari which has made the members of the ex-landlords to take the business or other pursuits and they are not keen to live in villages shorn of their prestige.

The opening of communications which has been a marked feature of Dhanbad district has led to a bigger turnover of trade and commerce especially at the markets of Jharia, Chirkunda, etc., which are concentrated in the towns. As centres of trade and commerce towns are developing and more townships are on the way.

There has been a concentration of more and more Government offices in some of the towns which has also led an increase in urban population. The rapid industrialisation of the district has also led to an increase in urban population. The opening of some of Community Development Block offices in urban and rural areas has added to urban population. The development of communications has also made the population easy to mobilise and the towns are easier of access which is an incentive to settle in towns but keeping up a contact with the village houses.

The population of Dhanbad town (including both the Municipal area and the Railway colony) increased from 12,951 in 1921 when it was treated as a town for the first time to 34,077 in 1951 the net increase in 30 years being 21,126 or 163.79 per cent. Jharia which is about five miles from Dhanbad was raised to urban status in 1941. Its population increased from 8,037 in 1941 to 26,418 in 10 years. Sindri was included in the list of towns for the first time in 1951.

Dhanbad is the oldest and the largest town with a population of 57,473 according to 1961 provisional census figure. It is on the Grand Chord line of the Eastern Railway with branches striking out and connecting it with most of the important colliery centres on the south. It is also connected with Grand Trunk Road, which runs four miles to the north, by two roads. Besides the usual offices of the district and subdivisional administrations, it also has the offices of the Chief Inspector of Mines of the Government of India, the Coal Mines Welfare Commissioner, the Jharia Mines Board of Health and the Jharia Water Board. The only mining institution in India, the Dhanbad School of Mines, is located here. Several road routes emanate from it connecting Dhanbad with Asansol, Patna, Gaya, Hazaribagh, Purulia, Ranchi, and Jamshedpur, etc. It is a fast growing town and the population has increased about 4.5 times since 1921. The second largest town, Jharia (33,305), was included in the list of towns for the first time in 1941. It is the heart of an important coal mining area. The population of this town has increased by about 54 per cent over 1941 total.

Sindri has been treated as a town in 1951. The old revenue *mauzas* of Sindri, Saharpura, Donegarh, Uparhandra and Hetkandra have been transformed in the course of only two or three years into a neat little township with a population of 41,849. This development is directly attributable to the establishment of the Sindri Fertiliser Factory. A well-equipped electrical and mechanical college known as the Bihar Institute of Technology has been opened by the State Government who have also set up a superphosphate factory here.

LANGUAGE.

The languages in Dhanbad district mostly come from three distinct stocks. One is the Munda family of languages which includes Ho, Mundari, Santhali, Kharia, Kora, Karwa and Bhumij. The other is the Dravidian family of languages which includes Telugu, Tamil and other Dravidian languages. The rest are of the Indo-Aryan stock which includes Hindi, Bengali, Punjabi, Gujrati, Oriya, Urdu, Nepali, Marwari, etc. On account of the cosmopolitan character of the urban population of industrial areas distributed over the district there is a sprinkling of people speaking some of the European languages. The following table will show the strength as mother-tongue as mentioned in 1951 census:—

Languages.				Males.	Females.	Total.
1. Indo-Aryan languages—						
Hindi	..	..	..	2,71,154	2,04,389	4,75,543
Bengali	..	..	..	1,03,089	82,374	1,86,063
Punjabi	..	..	..	2,408	1,694	4,102
Gujrati	..	..	..	1,170	1,230	2,400
Oriya	..	..	..	827	840	1,667
Nepali	..	..	..	547	478	1,025
Marwari	..	..	..	319	89	408
Other Indo-Aryan languages	..	..	..	191	93	284
2. Munda languages—						
Santhali	..	..	..	24,209	24,996	49,205
Mundari	..	..	..	3,660	3,737	7,397
Ho	..	..	..	579	606	1,185
Kharia	..	..	..	387	403	790
Karwa	..	..	..	52	1	53
Kora	..	..	..	27	..	27
Bhumij	..	..	..	5	3	8

Languages.	Males.	Females.	Total.
3. Dravidian languages—			
Telugu	132	94	226
Tamil	139	59	198
Other Dravidian languages ..	265	219	484
Other languages of India—			
Pushtu	27	..	27
Asiatic languages foreign in India ..	54	5	59
European languages --			
English	200	270	549.

Like the previous censuses Urdu has not been enumerated separately and had been clubbed together with Hindi. Though Urdu has a separate entity but for the facilities of the interested persons in the language, the census had given the number of Urdu-speaking people as 33,932.

Hindi is the principal language of the district. According to census of 1951, Hindi-speaking people were about 65 per cent of the total population, which shows the popularity of this language. Hindi has now been adopted as the National language of our country and because of this, it is becoming popular even among the non-Hindi speakers and, therefore, it has become essential for every gazetted and non-gazetted staff of the Government to pass the departmental examinations in Hindi.

According to the above table the Bengali-speaking population is about 25.4 per cent of the total population and Santhali by about 6.8 per cent. The other Indo-Aryan languages have not made any impact in the district which will be evident from the above table. The Punjabis are mostly displaced persons and their number in the district is small. Similar is the case with the Gujrati-speaking people so far as the number is concerned.

"*Khortha*" is the popular local dialect and has a large mixture of Hindi. The Bengali inhabitants of the district who have been here for generations use this dialect in their houses and this dialect is well understood by Hindi-speaking people. A large number of Hindi-speaking local inhabitants speak fluently the Bengali languages. Most of the people of Shahabad and Balia districts who have migrated to this district have adopted the local dialect in place of their own "*Bhojpuri*".

Bilingualism.

The table given below shows the bilingualism in the district, i.e., it gives the number of persons who commonly use other Indian languages in their everyday life in addition to (and sometimes largely in supersession of) their mother-tongue*:-

Mother-tongue.	Total speakers.	Total persons returned as speaking of a language subsidiary to that shown in column.		Subsidiary language.
1. Hindi	4,75,513	71,600	Bengali ..	66,827
			Santhali ..	2,621
			Gujrati ..	1,412
			Punjabi ..	320
			Mundari ..	219
			Oriya ..	167
			Marwari ..	14
			Sindhi ..	9
			Madraai ..	6
			Marathi ..	2
			Pushtu ..	1
			Nepali ..	1
			Telugu ..	1
2. Bengali	1,80,063	62,386	Hindi ..	59,566
			Santhali ..	2,284
			Oriya ..	322
			Gujrati ..	117
			Punjabi ..	84
			Mundari ..	13
3. Santhali	49,205	26,658	Hindi ..	17,841
			Bengali ..	8,690
			Mundari ..	57
			Gujrati ..	11
			Punjabi ..	9
			Oriya ..	8
			Marwari ..	2
4. Punjabi	4,102	2,206	Hindi ..	2,015
			Bengali ..	104
			Orson ..	67
			Santhali ..	19
			Oriya ..	1
5. Mundari	7,397	3,340	Hindi ..	2,768
			Bengali ..	434
			Santhali ..	124
			Gujrati ..	8
			Oriya ..	3
			Telugu ..	3

The most popular languages of the district are Hindi, Bengali, and Urdu.

* District Census Handbook of Dhanbad, 1951, page 70.

RELIGION AND CASTE.

The Hindus form the majority of the population. Next to Hindus are the Muhammadans. The Christians and Anglo-Indians form only small minority groups. The figures of each community as enumerated in the census of 1951 are as follows*:-

Religions.	Persons.	Males.	Females.
Hindus	6,26,814	3,47,044	2,79,770
Muhammadans	88,052	51,528	36,524
Sikhs	4,429	3,084	1,345
Jains	359	130	229
Buddhists	24	15	9
Christians	7,790	5,312	2,478
Jews	5	1	4

From the above table it is apparent that the Hindus are predominant in the district. They form about 85.4 per cent of the population. The percentage of Muhammadans is about 12.1 per cent and the other communities form only 2.5 per cent of the population.

Secondly the total population of tribal males under other religions is 3,008 while that of females is 1,471. The total male population under "other religions", non-tribal is 18 while the female population is nil.

The Hindus as well as the Muhammadans are evenly distributed according to their respective proportion both in the rural and urban areas. All the other minor communities, viz., the Sikhs, Jains, Buddhists, Christians and Jews are mostly found in the urban areas, their number in the rural areas is very small.

GENERAL STRUCTURE.

The district of Dhanbad which comprises of the original sub-district of the same name and Chas and Chandankeary *thanas* which have been recently annexed to it by the Transfer of Territories Act has a kind of population which makes an interesting study by itself. The total population in the original sub-district enumerated in 1951 was 7,31,700. To this has been added a further population of 1,85,000 inhabiting the tract known as Chas Revenue *thana*. The growth of population in the original sub-district by itself is an interesting study. In the first census taken in 1872 very meagre records were available and no reliance could be placed on the figures collected in that year. A more definite census came to be made in

* District Census Handbook of Dhanbad, pages 74-75.

1881 and the sub-district seems to have had a population of 1,54,742. In 1891 beginnings were made of an industrial expansion and the census recorded an increase by 12.8 per cent over 1881 figures. In the first decade after that the rise in population was 25.1 per cent over 1881 and 1900. This was accounted for by a large scale immigration from the western districts of Bihar and Jharia Revenue *thana* attracted a great bulk of immigrants recording an increase of 55 per cent in its population. This rise became a steady feature due to the growth of Mining Industry and in spite of virulent outbreak of cholera in the decade between 1901 and 1911 there was an increase of 38.6 per cent over the 1901 total. In the period between 1911 and 1920 there were annual epidemics of cholera and influenza which carried away a great number of people, but in spite of the devastation wrought during those years the population increased by 18.2 per cent, and this was largely accounted for by immigrants from outside. Though the cholera and influenza epidemics deterred a great number of people from coming over to Jharia fields in those years of boom, yet when all the circumstances were taken into consideration it would be found that the rate of immigration had been quite considerable. There was, however, a slump in the coal trade in the period between 1925 and 1930. The rate of immigration decreased and the rise was only 14.8 per cent in spite of good condition of public health. In 1931 to 1940 the rise was 11.9 per cent. With the outbreak of the Second World War the coal prices shot up and there was again a boom in the coal market with a consequent rise of immigrants from outside the district and the population had risen to 25.6 per cent in the decade ending in 1951. The rise in the population is most in Jharia and Sindri *thanas* and the next rise is in Nirsra Revenue *thana* which contains the Maithon Dam. It will be seen, therefore, that between 1901 to 1951 the population had increased by 4,54,578 and large part of this increase was due to immigration from outside.

Another interesting fact that has to be noted in this connection is that out of 7,31,700 enumerated in the sub-district, only 5,13,319 were enumerated having their birth places in the original district of Manbhum of which this sub-district was a part. About 53,143 were the immigrants from outside the State and was of a floating character. The sex proportion in the immigrants from outside the State shows this, while 35,032 were the number of males enumerated, the females were only 18,111. This shows that a great number of those who had come in from outside the State had no intention to set up a permanent abode, and live with their families excepting in the case of the migrants from West Bengal and Madhya Pradesh in whose case the sex proportion is considerably higher than in the case of migrants from other States. There were 19,070 enumerated as belonging to countries beyond India including those coming in from Pakistan. It will also appear that amongst those coming in from Pakistan both East and West quite a large number were

migrants of permanent nature as their sex proportion would indicate. 11,035 were the total male persons, coming in from both wings of Pakistan and 7,056 were females. It will be found that about 73,000 enumerated in this district during 1951 census came from outside the State. Rest of 7,31,700 were the persons from the State, of which only 5,13,319 were born in the original district of Manbhum comprising Purulia and Dhanbad. Out of 6,59,387 persons belonging to the State, 1,46,068 belonged to places outside the district. A considerable proportion of those persons recorded to have been born within the district of Purulia and Dhanbad are the sons and daughters of recent immigrants from other districts of the State. It will be plain from this that it is difficult to ascertain what is the exact number of really indigenous population of the sub-district.

The foregoing comments will show that ethnic character and composition has been under stress of continual immigration. The culture of the people is bound to undergo modification of a heterogeneous nature. Each group of immigrants is bound to impart some characteristic of their culture. But in spite of this inter-mixture which has considerably softened the sharp lines of ethnic group, the original characteristic of indigenous groups of population is retained to a great extent. Manbhum of which this sub-district had been a part till 1st of November, 1956 has been a tract where nature's experiment to slow and gradual absorption of certain tribals into Hinduism was being performed for centuries and from that stand point Dhanbad presents an interesting ethnic study.

To what ethnic group the original population belonged is very difficult to determine at present. The real "autochthon" cannot be determined for various reasons and Mr. Dalton and Mr. Beglar are of the opinion that the original inhabitants of the district had a Jain culture. The *Saraks* of the Para and Raghunathpur *parganas* of the original district of Manbhum of which the present district is a part, seem to be descended from those early Jains and the traces of this descent has been left in their name *Saraks* equivalent to *Sarabaks* of Jain religion. They are mostly vaishnavites at the present day and abstain from animal food and strictly adhere to non-killing. They have a custom like the Jain Marwari to finish their meals before evening. Most of them have taken to cultivation and they call themselves Hindu. It is estimated by some authorities especially Mr. Dalton that in 5th and 6th century B.C. the whole tract known as the district of Manbhum was suffused by a Jaina culture.*

It will appear also that though at that time this tract was not so extensively cultivated as Magadha, it had traces of flourishing civilisation. Some roads from Tamralipta to Patna and Rajgir and Gaya passed through Pakbira, Telkupi, Jharria and the extensive ruins in Telkupi and Para indicate this fact. There seems to have been another road from Tamralipta to Banaras via Manbazar, Ranchi and

*See "Jainism in Bihar" by P. C. Roy Chaudhury.

the ruins at Katras suggest that there was a road connecting these two roads. Mr. Gokhale had drawn an inference from the ruins of these temples that at the time there was considerable affluence and the local ruler had established peace in the country. The tract seems to have been under the rule of Sasanka, a great persecutor of Buddhism and heretical religion and is mentioned as such by Hiuen-Tsang in his accounts. However that may be peace seems to have prevailed, which induced the merchants to lavish money over buildings and temples the ruins of which are found today.

Later near about the 7th century A.D. the tract seems to have been completely Hinduised and this was not by any force of arms but by slow penetration of Hindu intellect. A theory is propounded that the aboriginals of Chotanagpur who are found in great numbers in the tract had been pressed out into this region by Aryan migration to Magadha, and near about the 10th century they began to take refuge in this part of the country. To say, therefore, that the so called aboriginals were the real "autochthon" of this tract will be a mistake. Mr. Beglar and Mr. Dalton are of opinion that Mundas and Bhumijis were tribes who originally inhabited in Magadha tract and had been pressed out of the country into this region, where they found it convenient to reside and carry on their avocations. For a time they remained peaceful, but it seems from all accounts available, that near about the end of the 10th century, being reinforced by further immigration from the north and west, these aboriginal tribes gained superiority and almost destroyed the Hindu influence in the locality. For the next few hundred years the cultural history is not known. In the Muhammadan period (15th century A.D.) when *Bhabishya Puran* was compiled, we find that the population of the area including all those areas contained in the jungle *mahals* has been described as people of a short stature, dark complexion, heretic in their habits, and their custom described as that being of *Rakshasas*, their women are described as no better than *Rakshasis*. The further description that is given in the *Puran* is that the people are addicted to strong drink and have no scruples about food. Nevertheless they had begun to claim the status of Kshatriyas because of their war-like nature though they conformed to none of the Hindu religious practices and were given to worship deities who could be hardly called Hindu. Evidently the *Puran* was mentioning the animist of the Dravidian Dolicho Cephalic stock which are found in abundance even at this period amongst the aboriginals. It will, therefore, be clear that by the 15th century A.D. ethnic composition of the locality had considerably changed and the Indo-Aryans who might have been living in the tract had been completely overwhelmed by these people.

Nevertheless the Indo-Aryans seem to have exercised great influence in reforming the tribals and already in the 15th century there was a movement afoot by which the tribals wanted to be upgraded or absorbed into Hinduism in spite of oppositions from the

Hindus rank. By this time the proselytizing capacity of the Hindus was becoming closed and the caste and sub-caste had emerged in definite and concrete forms. Further the admission was gradually becoming difficult and in later years became almost impossible for any tribe to be absorbed into Hindu fold. In spite of these deficiencies and the rigidity that have crept into Hindu society there seems to have been some vigour left in the Hinduism itself, and the subsequent cultural history of Manbhum of which this present district is a part is a history of slow and gradual absorption of the tribals into Hindu fold.

There had been further immigrations of aboriginals into this tract from Hazaribagh and Ranchi districts in later period. The trace of the Santhals is ascribed to some later period. The Santhals who are found in numbers in Manbhum as also in this sub-district seem to have migrated from north and west. According to some authority like Mr. Dalton they settled in Chai and Champa in Hazaribagh district. Their traditions which will be referred to later described a great migration from this tract of Chai and Champa to Manbhum, Dhalbhum and finally to Santhal Parganas where they seem to have settled. Their migration is still continuing eastwards in the districts of Bengal and even to further east. Mr. E. A. Gait writing in 1911 said that the Santhal immigration is still continuing eastwards and it was difficult to foretell how and where it will stop. However, quite a large number amounting to more than 2,35,000 was found to have settled in the district of Manbhum in 1921. In 1951 the Dhanbad sub-district *minus* the Chas and Chandankeary *thanas* which is comprised within the present district of Dhanbad accounted for nearly 50 thousand people speaking Santhali and they seem to have more or less their permanent abode and in spite of tendency to migrate eastward, it can safely be assumed that these Santhals have adopted this district as their home. There has been similar immigration of other tribals. It will appear to be difficult from the previous account to find out the real 'autochthon' of this district.

Whatever that may be we can for working purposes take the Bhumij who were a comparatively recent immigrants as somewhat autochthonous in the original district of Manbhum. According to some theory, being pressed by the Indo-Aryan out of Magadha tract, they settled down in Manbhum. The word 'Bhumij' means "Autochthon" sprung out of the land. When they came in great number and had settled for some century they began to be regarded by later migrant as having been born out of this land and with Hindus with whom probably they lived at peace for two centuries, but being encouraged by the great influx from the north and west were tempted to overwhelm them and establish a Bhumij *swaraj* in the whole tract comprised in what was erstwhile jungle *mahal* district. Not many of them are to be found at present in this district and in the last census Dhanbad district *minus* the Chas and

Chandankeary *thanas* recorded only eight persons speaking Bhumij dialect. However, Mr. Dalton thinks that the Bhuian community of the northern part of the district of Manbhum which is comprised in this district are akin to Bhumij of the earlier period.

BHUMIJ.

It is, however, difficult to say whether Bhumij and the Bhuian are the same. At one time they might have been in great number throughout the entire district of Manbhum of which this present district is a part but during the recent history the activities of the Bhumij confined to mostly Barabhum, Dhalbhum and a part of Midnapur. Mr. Risley writing in 1903 considered this tribe to be of Munda origin and almost identified them with the Mundas. This theory was based on the fact that a branch of the present inhabitants use the Munda language and call themselves Muras. Like all Kolarian tribes they build no temples but worship mountain or Buru in the form of a stone smeared with vermilion which is set up in a *Sarna* of *Jahira*, the sacred grave near the village. Now these things still continue amongst the Bhumij west of Ajodhya range. On the east of Ajodhya range the title of Mura has been replaced by the title *Sardar* and almost all the Bhumij speak Bengali. They are fast adopting Hinduism and relegating the tribal deities to their female folks. They are also trying to claim a *kshatriya* status. After the Bhumij *swaraj* has been established they reigned for a time but there seems to have some fresh Hindu migration and the name of Bhumij was given to these persons by the Hindu immigrants from outside as they found them in possession of the country. The hinduisation of the Bhumij was expedited after this period. There seems to have been no political pressure to get them hinduised for by this time Hinduism had developed sufficient nostalgia to keep away from and refuse admission into their fold any tribe of heretical habits. In spite of that there seems to have been an effort on those who have been overwhelmed to upgrade themselves and gain a forced admission into the Hindu fold. The present day Bhumij in the east of Ajodhya range described themselves as Hindus and returned themselves as such in the last census. It is by a process of slow absorption that a whole tribe inhabiting the eastern portion of Ajodhya hills became converted into a mere caste forsaking their own language, not by any persecution or by any attempt at conversion but probably in spite of the Hindu reluctance to admit them into their fold. We need not mention in detail much about this race which recorded themselves to be 'autochthon' of the original district of Manbhum and probably were at a time also inhabitants of this district. The reason is that they are not to be found in any number in this district.

SANTHALS.

The case of the Santals is quite different. They seem to have come later in the districts of Manbhum, Midnapur, etc., and their immigration is still continuing eastward in the plains of Bengal.

Mr. Risley recorded them as belonging to pure Dravidian stock. Their complexion vary from a dark brown, to charcoal like black. Anthropologically nose approach is that of the Negroes, the bridge is a little more depressed in relation to the orbits than in the case with the Hindus. The mouth is large and lips are thick and projecting. The hair is coarse and black, occasionally curling, zygomatic arches are prominent while proportion of the skull approaches the dolicho cephalic type. Mr. Risley recorded a tradition which is still current amongst the Santhals, that the Santhals originated from a tribe of wild goose "*Hansdak*" which laid two eggs. From these two eggs were born *Pilchu Haram* and *Pilchu Ayo*. These begot the ancestors of seven sub-tribes: *Hansdak*, *Murmum*, *Kishku*, *Hembrom*, *Marandi*, *Soren* and *Tudu*. The earliest abode was *Ahuripipri* and Mr. Skreksrud identified this place with *pargana* *Ahuri* in the *Hazaribagh* district. From this place they went westward to *Khoj-kaman* where all of them were destroyed for their wickedness by a fire rain excepting a single pair who were saved in a cave of mountain, *Hara*. From *Hara* they went to *Sasanbera* a plain on the bank of the great river (presumably *Damodar*). After that to *Jarpi* where they were obstructed by the great mountain *Marangburu* through which they could not find a pass. Here they offered sacrifice to the mountain God and prayed him to lead them through. After a while they found a pass leading to the country called *Ahiri* where they for a time dwelt and later went to *Kendi* and *Chai* and finally to *Champa*. In *Champa* they lived for many generations and there the present institution of the tribe was formed. At last the Hindus had driven them down from *Champa* and they established themselves in *Sant* and ruled there for two hundred years. Again pressed by the Hindus they wandered under the *Raja Hamir Singh* to the eastern part of *Manbhum* district near *Panchet*. The *Raja* having adopted the Hindu religion and having set up as a *Rajput* the people left him to rule over Hindus and wandered on to *Santhal Parganas* where they are now settled. Mr. Risley did not place much historical value on this tradition and tried to ascertain the real original habitant of the race by independent methods.

Mr. Skreksrud and Colonel Dalton have two independent theories as to from where the Santhals came. While Mr. Skreksrud is of the opinion that they were pressed into the *Chotanagpur* plateau by the Aryan pressure on the north-western tract known as *Magadha*, Colonel Dalton considered them to have come originally from *Assam*. Mr. Risley has no opinion about the place of their real origin and accepts that both the views might have the same degree of correctness or incorrectness. It, however, appears clear from the tradition that at some period the Santhals had settled in *Ahirpipri* in *Hazaribagh* district and also in *Chai* and *Champa*. The tradition mentioned by the Santhals has some confirmation by another tradition mentioned by Colonel Dalton that old fort of *Chai* was occupied by one *Jowara*, a *Santhal Raja* who destroyed himself .

and his family on hearing of an approach of a Muhammadan army under Syed Ibrahim alias Malik Baya, a General of Mohammad Tuglak who died in 1353 A.D.

A further corroboration is available by the accounts of Rev. J. Philips in the *Annals of Rural Bengal* in which he has recorded another tradition of the Santhals, dwelling in the Chai and Champa where they greatly multiplied. There are two gates, Ahani gate and Behani gate in Chai and Champa fort. The attack by Malik Baya must have had some results but generally speaking the Santhals were driven out of the tract in Chai, Champa and Ahirpipri in Hazaribagh district by the pressure of Hindu migration. Later a part of the tribe made Manbhum their home and not till the advent of 19th century they were found in the Santhal Parganas, where at present day they are found in great numbers.

The Santhals are a mild, timid and habitually law-abiding and obliging people. The essential characteristics of the Santhals recorded by the several writers have not changed very much though under the stress of the modern civilization a good deal of change is noticeable amongst them also.

They have special knack for clearing jungles and converting uninhabited portion into habited villages. It is said that in some tracts they are averse to payment of rents but the zamindars favour them because of their capacity to reclaim lands and clear jungles. The relationship between the zamindars and the Santhals were never very strained in this district excepting at Tundi where probably for the unreasonableness of the zamindar the Santhals proved recalcitrant and successive Commissioners had to intervene one of them being Colonel Dalton. A compromise was eventually reached by which the Santhals of Tundi area have special rights in the jungle which their less fortunate brothers elsewhere have not. On the whole the zamindar treated them with some kind of consideration. The Santhals were an extremely conservative people and not till recent times they are to violate their own tribal laws. Nevertheless they are people with a sense of cleanliness and beauty which is in contrast with the low class Hindus. We find scarcely a Santhal village where dirt will be found. They make their abode look cleaner and aesthetically superior to those surrounding them. The Santhals in their dress are much cleaner and there is a distinct aversness to wearing soiled cloths though there is no objection to wearing clothes which are torn and tattered. The traditional Santhal male will have nothing to do with anything except a loin cloth wrapped round the lower portion of his body up to the knee. In some cases the dress is even more concise being confined to a piece of cloth tied round the hips and just enough to cover the genitals. These extreme cases of scantiness of dress are fast disappearing amongst them and even in poorer classes the dress is somewhat more lavish than that. Both the young men and women

are fond of ornaments. The Santhal young men sometimes wear their hair long, and necklaces made of *Munga* (corals) and other such materials worn round the neck. The females prefer silver ornaments for aesthetic reasons, for they contrast well with their complexion. *Hansuli* and the *Kangna* are much in use. More often than not the Santhal girls will love to bedeck their hair with flower and their love for flower is noteworthy. The Santhals though great clearer of jungle and naturally industrious are not good cultivators and they raise comparatively poorer crops which supply their necessities. In modern times, however, improvements are being sought to be introduced in their cultivation system and their necessities have increased. Most Santhals now a days have a shirt to their back and more educated one will like to have the lavishness of much better dress than his unlettered forefathers had. Necessarily the mode of cultivation has to be changed because their necessities are not met by the home-grown *rabi* crops and home-spun yarns which they wove into cloths more durable and lasting than the imported cloth or the mill-made ones. Like Ho and other aboriginals, traditional Santhal girls used to wear a *sari* which is longer than those worn by their Hindu sister. The *sari* generally reaches the lower portion up to the ankle a little over it and it is gracefully twined round the upper portion of the left shoulder of the chiselled body. The head is not covered. At the present day, however, the Santhal woman has begun to wear blouses and *saris* purchased from the *bazar*.

Nevertheless their cleanly habits still continue and one can find out a Santhal from other labouring classes by the care that a Santhal takes to avoid his cloths being soiled with dirt.

Five more sub-tribes were added to the original seven sub-tribes. They are Besra, Baske, Bheria, Paoria and Choren; Baske sect was formed after the original sub-tribes had come into existence because of the fact the man who founded sect originally, made offering to their God with their breakfast. The Besra is said to have descended from one Besra who is believed to have been licentious and a degraded one. A Besra Santhal is generally looked down. The other two Paoria and Choren seemed to have been totem names, Paoria standing for pegion, and Choren for lizard. The Beediya sect is said to have descended from Santhal girl who could not account for the fathership of her child from whom the sect descended. Some Santhals say that the father was a Rajput and the mother was a girl of Kisku sect. This community is looked down because the Santhal is very solicitous of his women's honour so far as the outsiders are concerned.

In their food habits the Santhals have no nice scruples about any kind of meat and during the tribal hunt which is held annually everywhere there is considerable Santhal population, they kill almost every kind of animals and take their flesh. They generally

do not take food cooked by low class Hindus but make an exception of the Kurmi Mahatos whom according to one tradition they regard as their half brothers.

There is no caste system within the Santhal community and *parda* is out of question. Their women go about freely and earn together with their male folks, sometimes as much as the men do. By nature they are industrious and mild but extremely improvident and the traditional Santhal has scarcely any thought for the morrow. They will work the whole day, make little out of the day according to their capacity, and spend away the whole earning in dance and drinking and set out to work the next day. If they have accumulated something to lay by, they stop working till they have feasted and danced away the savings. There is of course considerable change towards the better and even the Santhal now is looking forward for the morrow and is not so improvident as he used to be some 20 years back.

The social structure of the Santhal is singularly complete and self-sufficient. In villages which are exclusively his and dominated by the Santhals (and such a village can be found even today in the area of the Santhal Parganas), his affairs are generally controlled by the *Manjhi* or the village headman. He works through an assistant who is called *Paramanik*. This assistant holds some lands while the *Manjhis* are generally the *ijaradars* or the collectors of rents and remain responsible for payment of rent and allot lands amongst raiyats. *Jog Manjhis* and *Jog Paramaniks* are the executive officers through whom the *Manjhis* and *Paramaniks* are supposed to be the superintendent of the morals and keep a watch over the tribal morals. Then there is *Naiki* or the village priest of the aboriginal deities and the *Kurum Naik* is the assistant priest who propitiates the spirit of the hills and the jungles by scratching his arms till they bleed, and mixing the blood with rice, and placing it in a spot frequented by the spirits. Then there is the *gorait*, village messenger who acts as peon to the headman and is to some extent the servant of the zamindar. His chief duty within the village is to bring the *Manjhi*, the *Paramanik* and raiyats before the zamindar. Then there are the *Paraganais*, that is the head of the tribe in certain area. The disputes and land disputes of any kind used to be settled in a meeting of all the *Parganais* in the area during the tribal hunt or occasion like that. The Santhals seldom took resort to courts in former times and this helped the maintenance of the village order of the Santhals to a great extent. It will show elsewhere that this system is gradually dwindling except in certain areas in the Santhal Parganas where by special legislation an attempt has been made to preserve the Santhal village system. The Santhals indifferently bury or cremate their dead bodies.

In matters of inheritance the tribals follow their own custom except when they claim to be Hinduised. The sons inherit in equal shares and the daughter has no claim to a portion as of right but usually gets a cow given to her when the property is divided. Failing sons the father takes, failing him the brothers, after them the male agnates but in case there are no male agnates the daughters inherit transmitting the succession to her children. Mr. Risley is of opinion that the Santhals have nothing in common with the Hindu succession, but if these customs are taken into account it will be found that the agnatic succession is a rule of *Mitakshara* law and females exclusion is quite in consonance with that doctrine. The only outstanding difference seems to be that if a man dies leaving a widow or young son the widow manages the properties till all the sons are old enough to divide the property and to start a separate household. Even so the widow takes up her abode with the youngest. It is only in a case of remarriage by the widow that the agnates can take the property in trust till the sons are of age and she gets nothing. The Hindu widow estate is not known but Mr. Risley is not quite justified in saying that there is nothing in common between the Hindu succession and tribal succession of the Santhals. There are points of similarity, though there are differences also of fundamental nature.

In religion the Santhals are classed as an animist, a very vague term, which can mean many things. In practice the Santhals believe in an all powerful deity from whom all the manifestations of nature have sprung. He does not seem to have any clear idea or a philosophy as to what kind of deity it is. But all the same his reference to all the natural phenomenon in a certain way shows that he regards them as manifestations of the '*Thakur*'. If it is raining the Santhal will refer to it as 'He rains'. If it is thundering he will refer to it "He thunders".

Besides this vague overall deity to whom offerings are no longer made for his absolutely impartial attitude, there are a number of deities to whom the Santhals offer their reverence. Mr. Risley is of opinion that it is doubtful whether this overall *Thakur* which has sometimes been identified with the sun was really a Santhal invention or not. He says that this was probably a later introduction into the Santhal mythology of the Hindu 'Brahman' in a vague form. It is difficult to say whether this is so or not but Mr. Risley's contention seems to have some justification because this deity has an alias '*Thakur*'. The other deity which are now in fashion amongst the Santhals are the *Marang Buru* the great mountain. The '*Moronko*', the fire God who are supposed to be five in number, '*Jahir Era*' a sister of *Moronko*, '*Gossain Era*' another sister of *Moronko*. The *Pargana* was the chief of the *Bongas* or Gods and master of witches. *Manjhi* is a sort of second in command to *Pargana*. The Gods *Manjhi* and *Pargana* are peculiarly anthropomorphous because they seem to be corresponding to

the *Manjhi* and *Pargana* of the Santhal village system. The idea seems to be that God like men needs supervising officials like the *Pargana* and the *Manjhis*. All these Gods have their place allotted in *Jahirthan* excepting *Morong Buru* who is worshipped privately in the family. Besides these Gods each family has two special kinds of Gods, *Orak Bonga* and *Abge Bonga*. The name of *Orak Bonga* of a particular family are many such as *Barpahar*, *Deshwali*, *Sash*, etc. There are similarly *Abge Bongas*, such as *Dharasore*, *Ketke Mundra*, *Nilachandi*, *Kudra-chandi*, etc. The name of *Orak Bonga* of a particular family is never known to any one in the family excepting the eldest son and when the names were attempted to be collected by Mr. Skrefsrud he could do so only through those Santhals who had been converted to Christianity. Human sacrifice to *Morong Buru* were sometimes made, but at present the practice has discontinued owing to the Government's vigilance.

Belief in witchcraft is peculiar to all Adibasis and the Santhal is not free from them. It is not infrequently that murder takes place on the suspicion that a certain disease in a family or village is caused by a certain person believed to be a witch. Whether a disease has been caused by the witchcraft or not is detected by a particular process by the Santhal, and if he is confirmed that it has been caused by some witch he finds out the man or woman whom he suspects to be cause of the disease.

There are some interesting stories in the Santhal mythology which needs mention. The eclipse is believed to have been caused by a God called *Dusad* catching hold of the sun or the moon. It is said that in a year of famine the sun and the moon stood pledged for the mankind for grains lent by God *Dusad*. The debt has not yet been repaid and every year the God stretches out his hand and catches hold of the sun or the moon in order to be paid back the loan of grain for which this God stood surety. It is for this reason that during the eclipse the Santhals bring out their stores of grains in the open and make great noise with their kettle drums to propitiate the God *Dusad* so that he may release the sun or the moon from his clutches.

There is an interesting story about the sun and the moon. It is said that the sun and the moon begot many children called the stars (Evil) and the world grew so hot by their light that something seemed necessary to be done. The sun and the moon conferred together and it was agreed that the moon shall first devour her twelve daughters, while the sun will devour his 12 sons so that the heat abates. The moon being a woman and more tricky bagged all her 12 daughters and kept them concealed while the sun actually devoured all the children that remained with him. In the night all these 12 daughters were released and the sun found out his mistake. In rage he persued the moon and tried to cut off her head and would not release her till she relinquished two of her daughters the venus and serius which are found even in the

morning. But the sun remembers the perfidy of the moon and chases her every month and allows her rest only once in a month when she is in full bloom. It is noteworthy that the Santhal explains the phases of the moon this way.

So far as marriages are concerned we shall have occasions to deal with it later on. It can be said here that the Santhal marriage system obliterates illegitimacy and there can be hardly any illegitimate children amongst the Santhals except on the occasion when a Santhal girl runs away with a non-Santhal.

It will be noteworthy that there has been gradual Hinduisation even amongst the Santhals in the Sadar subdivision of the original district of Manbhum. In this district gravitation towards Hinduism is apparent from the names that the Santhals have begun to adopt. Names like Gopal Manjhi, Narayan Manjhi, Mahadeb Murmu, Jadu Soren have come to replace the traditional Santhal names such as Ledha Manjhi, Churka Hembrom, etc. A class of them call themselves Deshwali and returned themselves as Hindus. It appears that where the pressure of Hinduism was great, even though the Santhal had been numerous they were impressed by the superior calibre of the Hindu intellect and tried to upgrade themselves, though there seems to have been no inclination on the part of the Hindu to take them into their fold. It should be noted that where a tribe converted itself into a caste, the caste tended to be depressed. This tendency is noticed everywhere, and those tribes who have claimed themselves to be Hinduised, have invariably been in the lowest rung of the Hindu ladder because of the fact that the Hindu society till the present decade showed an extreme unwillingness to admit any other race or tribe into their fold.

It would appear somewhat surprising why Christianity or Islam could not make a headway amongst the tribes in this area in spite of large promises of equality that they made and the large material advantage that followed from being converted into a Christian. The tendency had always been to be Hinduised and there are evidence that the whole tribe had converted themselves into a caste in the lowest rung of the Hindu ladder. This is a phenomenon which in our opinion requires some explanation.

One view seems to be possible. The tribal mind is essentially a conservative one. It could not bear the impact and the aggressiveness of a unitary system of Godhead without any variation. It would not readily discard its own deities and submit to a social system which would intrude too much upon its tribal organisation. That is precisely what the Christian Missionaries demand of the tribal. So far as Muslims are concerned, no conscious attempts at conversion seem to have been made for the Muslims who were always in a minority. Even if there were many the results would not have been much better except through fire and sword. The Hindus by their supreme unconcern about the tribal deities and organisation

made no intrusion upon their deities. It is by their own will that the tribal adopts a deity or two of the Hindu Pantheon and begins to claim to be under the Hindu fold while the tribal deities are retained in the beginning. Gradually they fall off and are relegated to people of lower order and females and finally in some cases they are practically abandoned. The tribal system of social organisation remains uninfluenced for some time and continues till to this day uninfluenced in many cases. Some sort of a hotch potch Hinduism is adopted. Some innovations are made in the tribal laws which suit the genius of the tribe and finally the tribal system though leaving some relics behind is abrogated. Thus a tribe becomes converted into a caste slowly and gradually they force themselves into the Hindu fold, and what has been achieved by large freedom allowed to the tribe by the supreme unconcern shown by the Hindus, could not be achieved by the more aggressive and solicitous Missionaries. There is nothing so bad as too much solicitousness. A child under too much cares runs away from its guardian, but if the guardian be indifferent the child grows by itself and some how adopts himself to the environments.

This has precisely been the case with the tribals in the whole of Chotanagpur where conversion of Christianity is far outnumbered by wholesale conversion to Hinduism by slow and gradual process. More Oraons have converted themselves into *Tana Bhagats* in the district of Ranchi than the solicitousness of the Christian has been able to achieve amongst the tribal like Mundas and Oraons in the district.*

KURMI MAHATO.

This brings us to consideration of the wholesale conversion of another tribe known as Kurmi Mahato in this district. They are highly Hinduised and almost all of them profess the Hindu religion. They are beginning to claim a better status than they originally seem to have acquired in the Hindu fold and in point of culture they can be said to be definitely superior to the Santhals with whom they might have had some struggle during the ancient past. Mr. Dalton considered them to be akin to the Indo-Aryan group of Kurmis in Bihar. In *Descriptive Ethnology of Bengal* he seemed to have held that they have an Indo-Aryan look. In the original district of Manbhum they are particularly numerous and he notes that they might have had some struggle with the Santhals over whom they gained supremacy. Writing later Mr. Risley found them to be short and of dark complexion and quite distinct from the Kurmis of Bihar. He ascribed to them a Dravidian origin and he had good grounds to do so for they differ anthropometrically very little from the Santhals with whom they seem to have lived together for generations in this district. His impression was later

*Also please see the re-written District Gazetteer of Santal Parganas (P. C. R. C.).

confirmed by Dr. Grierson who considered them to be definitely of a Dravidian stock and held that they might have had a language of their own which had been replaced by either Bengali or Kurmali a very corrupt form of Eastern Magahi with a large sprinkling of Bengali in it. The tribe retained till recent times the Kolarian village system in which the Mahato is the village headman and controls all the village affairs like the *Manjhis* of the Santhals.

Mr. Coupland writing in 1911 accepted the view put forward by Risley and Grierson and by and large it has come to be accepted that the Kurmi Mahatos of Manbhum and Dhanbad were very distinct from the Kurmis of Bihar. In the case of former the 'R' is soft while in the case of the latter the 'R' is hard almost verging on a soft 'D'. In recent years there have been several cases from Manbhum district where tribal customs were pleaded. The case *Kirtibas Mahato vs. Budhan Mahato* reported in 6 P.L.T. page 604 is a case of a Hinduised Mahato. It was said that they were governed by their tribal laws. It was held that the aborigines in Chotanagpur denote a race and not a religion. It seems to have been accepted by the High Court that the Kurmi Mahatos were aborigines of Manbhum though they have been completely Hinduised. Later this decision was followed in *Ganesh Mahato vs. Shib Charan Mahato* (A.I.R. 1931 Patna 305). Both the parties to the suit were Chotanagpur Kurmis and both admitted that they were aborigines by race. The dispute was in regard to succession law by which they were governed. It was eventually held that where the parties to the suit admitted that originally they were aborigines but the families had subsequently become Hindus and had adopted Hindu religion, it was on the party alleging that they were not governed by the Hindu law of inheritance and succession to prove any special custom or rules prevailing amongst them. It was, therefore, accepted by such a tribunal as the High Court that the Kurmi Mahatos of this area are distinct in race from the Kurmis of Bihar. Mr. Risley's and Mr. Grierson's remarks have been amply vindicated in these cases. The fact is further established by the Mahatos' adherence till the present day to the worship of *Gramdevata* in the *Jahira* than that is in village grove closely resembling to *Jahirasthan* of the Santhals. Though *Jahira* is not so important to the Kurmi Mahatos who had been completely Hinduised as it is to the Santhals yet reverence is done to the God residing in the *Jahirasthan* by the village priest till this day.

There is one more fact which point distinctly to their Dravidian origin. Their look closely resembles those of the Santhals and Mr. Risley is quite justified in holding that there is very little to differentiate between a Santhal, Bhumij or a Mahato in this area. By one tradition recorded by Mr. Risley the Santhal considers the Kurmis as his half brother begotten by the same father on two mothers and even to this day the orthodox Santhals who disdain to take food from any other tribe or Hindu caste will willingly take

food cooked by a Kurmi Mahato. Besides till lately the Bihar contingent of Kurmis referred to the Chotanagpur Kurmis as Kol-Kurmis and in 1931 Mr. Lacey reports that the Superintendent, Purulia Leper Asylum could not persuade a Kurmi constable from Bihar to take food by the side of a local Kurmi patient. In early 20th century when Risley wrote about the caste he found them to be numerous in Mayurbhanj and Midnapore and opined that they were like the Santhals divided into sub-tribes with definite totems for each of the sub-tribe amongst the Kurmis. At the present day, however, the totemestic origin of the Kurmi *gotras* or sect cannot be traced while the Santhal totems can be identified by use of their surname, Soren, Marandi, Hansdak, etc. Kurmis, all of them use the common title of Mahato, making it practically impossible to determine whether they had a totem name or not. In rare exception as is reported by Mr. Lacey in *Census Report of 1933* that the Kurmi would pride himself as having a totem name such as 'Bak' a bird. This indicates that a considerable progress has been made towards Hinduism by this caste and in the present day the tendency amongst the Kurmis is to upgrade themselves into some higher caste. When Dalton wrote in 1872 the Kurmi though Hinduised to a very great extent was not treated as '*Jalacharaniya*' or a person from whom water can be accepted by a higher caste. That disability is retained to some extent. But the Kurmi Mahatos have certainly attained a place of pride and are much higher in rank than Bauri, Dome and certain other Hindu lower caste. In recent years there has been a tendency amongst the Kurmis to upgrade themselves still higher. The Kurmis of Bihar claim for themselves the status of Kshatriya, and probably in order to gain more numerousness the Chotanagpur contingent was also admitted in the general Kurmi fold in a resolution passed in a solemn conclave. A conference of the Kurmis was held in Muzaffarpur in 1929 and there were three delegates from Manbhum representing the Chotanagpur Kurmis. There it was decided that there was no difference between the Kurmis of Chotanagpur and the Kurmis of Bihar proper and that the Kurmis have a Kshatriya origin. The three delegates returned after donning the sacred thread on them. This conference was followed by a conference in Ghagrajuri in Manbhum which was attended by the representatives of the Kurmis of the Uttar Pradesh and Bihar and it was agreed in that conference that there would be inter-dining and inter-marriage between the Kurmis of Bihar and the Kurmis of Chotanagpur. It was also decided that the Kurmis had a Kshatriya origin and had a right to wear the sacred thread. In consonance of the resolution in the solemn conclave many Kurmis of this area began to wear the sacred thread and claimed the Kshatriya status for them, though there was opposition from some orthodox ranks. The zamindar of Panchet seems to have patronised the movement as most of his tenantry belonged to this class. However, though there was a tendency of upgrading themselves by gradual degree and pass themselves as

Jalacharaniya class for inter-dining and inter-marriage with other Kurmis, not much was achieved for sometime and the distinction between the two sects of Kurmis is still observed. Cases of inter-marriage are very rare and where they had been recorded they are mostly for private gain.

It has further to be noted that the Kurmis tried to banish many of their healthy social customs. The freedom allowed to their women to go to *bazar*, etc., began to be curtailed and denied, and it was agreed that no woman should go to the *bazar* unless accompanied by a male chaperon. In other words the Kurmis wanted to forget altogether their tribal origin and their affinities with the other tribals in the area. It may be said to their credit that they are much more industrious and enterprising than the other tribals in the area. Unlike the Santhals they have a much greater thought for the morrow and is not at all improvident. Almost all of them have abstained from drinking which is the characteristic of all the tribals specially the Santhals who take rice beer or *Handia* in great quantities during the festivals and not infrequently after the day's work is done. The Kurmis are, however, not expert in clearing jungles as the Santhal is, though much better and prudent cultivators. In recent times education has fast spread amongst the Kurmis and their scruples about food are much more pronounced than any other aboriginal tribe. The Kurmis for instance would not touch beef or pork which the Santhal would, though the Santhals usually do not kill cow.

There are clear indications in their social organisation showing that they belong to a Kolarian tribe. The Kurmi caste is organised in several sects, all exogamous. Some important *gotras* or the sects have ending "ar" such as Korewar, Bunowar, Hastawar, Kesariar, Sankhwar, Hindiar, Guliar, Swachahamutrawar. Obviously the *gotras* like Sankowar and Keshariar seem to have totemistic origin though it is difficult to say what was the actual totem in each case. The village headman is generally the Mahato but at the present day all the sects use the title of Mahato as their surname, and it is difficult from the names to decide to which sect a Kurmi belongs. The Kurmi has a tendency to discard their totems and more closely adhere to Hinduism and that explains why the sect name which is still prevalent amongst the Santhals, though they also have begun to use the title of Manjhi to denote all the Santhals, is not at all prevalent amongst the Kurmis.

So far as the village organisation is concerned the Mahato is the village headman and over Mahato is the *Deshmandal* who seems to be a super headman presiding over the village *sabhas* of ten or 12 villages. Then there is the *parganait* corresponding to Santhal *parganait* ruling over all the *Deshmandals* and *Mahatos* in matters social and cultural. At one time these *parganait*s, *Mahatos* and *Deshmandals* seem to have exercised a considerable influence over

the village population and all matters relating to caste and even civil disputes were decided in the *panchaiti* of the tribals by these officials. The modern tendency which will be noted hereafter is different and the institutions seem to have lost much ground in recent years.

So far as religion is concerned, the Kurmi Mahatos of this tract as also of the district of Purulia seem to be completely Hinduised. The office of the Brahmin priest is used in performance of the *Pujas* and other functions. There are however, certain offerings which are made by the Mahatos or *Layas*. Offerings of fowls are made before *gramdevata* before cultivation begins. The Kudra variously known as *Besaichandi* or *Kudrasiru* is similarly worshipped by the whole tribe. There are some other tribes who claim to be Hinduised and worship deities which have not found a place in the general Hindu pantheon. It may be mentioned that *gramdevata* who is worshipped in the grove of the village is not much of importance as the Hindu deities which the Mahatos have later adopted. Their worship has been relegated to lower order of priest. Besides these relics of the tribal nature there is another relic of importance. All men of Mahato families make offerings to some family deity or other which is different in nature from the Hindu deity. *Mahamai* is worshipped by every family by the females. Often it would be a piece of stone smeared with vermillion as is the *gramdevata* in *Jahirasthan*, or the Kudra. It is not exactly ascertainable as to whether the Kurmis had a similar custom like the Santhal which forbids them to disclose the name of their family deity *Orak-bonga* to any one but the eldest son. Besides the family deities the Mahato performs some kind of offerings in their respective fields during the cultivation season to God that is said to be presiding over the fields and crops. This God varies from man to man and is not a general one. The presiding deity of one field may be different from the presiding deity of the other and each owner has to offer sacrifice according to his own methods and means. All these distinctly point to the aboriginal origin of the tribe or the caste. It may be noted in this connection that the Mahatos though industrious and intelligent are averse to the mining profession, while the Santhals take to Mining very frequently, and are supposed to be good miners. A Mahato would not go underground and remain content with cultivation or any other subsidiary profession.

In recent times education has spread more rapidly amongst the Kurmis than any other caste classed as backward, and they are coming in larger proportion to take their place in offices in the district. Lawyers and men of other professions are more numerous amongst them than any other tribal caste of a depressed nature.

Marriage custom of these Mahatos will be dealt separately along with the other marriage custom prevalent in the district and not much can be said at present except that the Mahatos permit

divorce and widow re-marriage, etc. The general tendency is to adhere to the *Dayabhag* inheritance rules so far as succession is concerned. In great many cases in this district *Mitakhara* is claimed to be followed but often it happens in a suit that while one party alleges *Mitakhara* to be the rule of succession amongst them, the other party says that *Dayabhag* is the rule. In very few cases a claim is made that tribal custom is still followed in the area to which a party belongs and the tribal law is rather hard on them because it excludes the females altogether from succession. In this district Mahatos are spread over everywhere but a large concentration of them will be found in Baliapur, Jorapokhar, Chandankeari and Chas thanas.

BAURIS.

The next Dravidian class of a semi-aboriginal nature who are to be considered are the Bauris. They were quite numerous in the original district of Manbhum and spread throughout Dhanbad district. A particular concentration of them can be found in the part adjacent to Bengal that is in Nirsa and Chirkunda thanas. This caste whom Risley considered to be of Mongolo-Dravidian origin seems to have had a tribal origin and retained some traits of their tribal character. They are numerous not only in this district but also in other districts of Bengal such as Bankura, Burdwan and Birbhum. They have somewhat more regular features, than the Santhals though dark in complexion like the Santhals or Kurmis. Complexion varies from dark brown to coal black and where there has been mixture of blood with the Indo-Aryan which is not very infrequent considering the Bauri women's laxity in sexual habits, the complexion may be even light brown. This of course is not very general. The stature is medium. The Bauri as a caste is in the lowest rung of the Hindu order and do not retain much of their tribal system which in remote past they might have possessed. They were mostly palanquin bearers and lived by such menial jobs as day labourers having little or sometime no land of their own. Some of course used to hold lands in lieu of police duties under the Zamindar.

They, like the Santhals have taken to mining and until 10 or 12 years back quite a large number of Bauris and Santhals were to be found in the mines in this area. They are gradually losing their hold over this avenue of employment and are being replaced by more adventurous Bihar castes from North and West. The Bauri seems to be a comparatively poor worker than the Santhal though as a cultivator he is cleverer. In certain cases the Bauris had Ghatwali tenures which indicate that they were original inhabitants of this district and had wielded some influence. There are distinct traces of totemism, and the red backed heron and the dog are objects of reverence to the Bauri. If anybody molests a heron he stands in danger from being expelled from the caste. The Bauri's reverence for the dog is noted by the proverb that if the dog wails in disapproval no Bauri would perform his marriage. (*Kukur kare 'Kain'*

to *Baurir Biha nai*). The Bauri has strong objection in touching the horse's dung. Dogs are never killed, neither a dead dog is touched by a Bauri. If a dog is drowned in a tank the entire rainy season has to elapse before a Bauri could go to that tank. Like the aboriginal tribes the Bauri is addicted to strong drink which like the Santhals they do not distill but purchase from *bazar*. The Santhal is more addicted to rice beer prepared at his home with the ingredients which he collects by himself. The Bauri will take any kind of strong drink offered to him by *bazar* grog shop-holder though illicit distillation is not altogether unknown to them. The '*pachai*' form of liquor is sometimes prepared by them and consumed in great quantity. They have their caste *panchayat* though the tribal village system which they might have had at one time does not exist at the present. This fact has its disadvantages. The Bauri has sunk lower than any of those Dravidian or Kolarain classes which have forced themselves within the Hindu fold.

Be it said to their credit that the Bauris have added at least one deity to the Hindu pantheon and she is *Mansa* which is worshipped on the *Nagpanchami* day. Though this deity was not absolutely unknown and there are many traditions about *Lakshindar* and *Behula*, to raise her to a rank of those divinities who are entitled to offering at a particular period was no mean a job, and the Bauris did it along with another tribe called Bagdis who are not to be found in this district. *Mansa* has a general acceptance among the Hindus of the locality. The *Mansa* puja is done with great eclat and though commonly known as the festival of the Bauris is observed by some other castes also. A holiday is observed in this district and many other castes besides the Bauris partake in it.

Along with these deities the Bauris like the Santhals worship the great mountain but in their case it is known as *Barpahari*, *Kudrasini*, *Besaichandi*, which are distinctly aboriginal deities and have no connection with the Hindu pantheon. Till this day the Bauris have not shown any great desire to upgrade themselves. There is a sort of inferiority complex in the whole caste which makes them stick to their status though in recent times some changes in the mentality of the Bauris can be noted. The sexual habit of a Bauri woman is loose and no great importance is put to woman's chastity. The Bauri women live in unashamed concubinage with persons belonging to other castes and eventually decoy their paramour into their own caste by making them pay for a feast to the Bauri caste men. Divorce is permitted and easily obtained.

BHUIYANS.

Another class who can be classed as aboriginal or antochthon of this part are the Bhuiyans who can scarcely be distinguished from the Ghatwals. They have a distinct Dravidian origin according to Mr. Dalton. In recent years the Bhuiyans have upgraded themselves

in many cases because most of them performed police duties and many out of them became zamindars holding lands for the services they rendered.

It can be said that the Bhuiyan is much more Hinduised than the Bhumij of the original district of Manbhum and traces of any village system are not to be found amongst themselves. A special study has not been made about them but it has now come to be believed that the caste who call itself Ghatwar in parts of Chotanagpur are really Bhuiyans performing the police duties and holding lands in lieu of their services. This gave them a favourable position and some Bhuiyan zamindars claim a Kshatriya status for them. This claim eventually resulted in some cases in marriage of some Chotanagpur Bhuiyan *Rajas* with pure blooded Kshatriyas. The result that followed is that the great mass of Bhuiyans or Ghatwars tried to upgrade themselves in the Kshatriya class and the Ghatwars who can scarcely be separated from the Bhuiyan now say that they are Kshatriya. During our enquiry we came across Ghatwars who told us that there are several classes amongst them—first is Sings, the 2nd who bear the title Roy and 3rd bear the title Thakur and fourthly the lowest in order the Ghatwars, who call themselves Bhuiyans. The first three orders donne the sacred thread and on enquiry it was found that in some cases the sacred thread is donned after the performance of *Jagna*. The Bhuiyan who resorts to such a kind of sacred thread is debarred from taking to the plough and the informants say that in their cases they have donned the sacred thread without any ceremony and are not debarred from taking to the ploughs. It is in exceptional cases where the economic status of the man were such as permits him to keep away from the menial labour that the device of taking the sacred thread after the performance of *Jagna* is resorted to. Obviously only in cases of Bhuiyan zamindars this method is adopted while in other cases the sacred thread is donned as a mark of superiority by a simple ceremonial in the family itself. The lowest order of the Bhuiyans do not take to the sacred thread at all. It will be clear from the foregoing account that the Ghatwars and the Bhuiyans who called themselves Ghatwars have begun to claim a Kshatriya status for themselves while due to some orthodoxy in the caste itself one section has chosen to remain neglected in a lower order. Marks of animism are not traceable amongst this class. Our informant regarding this class says that those who have donned the sacred thread have mended their ways also. They do not permit divorce nor do they allow their widows to re-marry. But this is so only of the Ghatwar class of the Bhuiyans while among the lowest order who still call themselves Bhuiyans, widow re-marriage is permitted and divorces are recognised. Amongst the very well-to-do, the *pardah* has been adopted but the less fortunate class who call themselves Ghatwars have to labour and permit freedom to their women. It has to be remembered that there are a number of Bhuiyan zamindars who in consonance with the practice of all

zamindars of higher descent adopted the *pardah* system and kept their women in seclusion. Bhuiyans are more numerous in the present district of Dhanbad than they were in the Sadar subdivision in the original district of Manbhum and they take almost the same place in the present district as the Bhumij had in the southern part of the original district of Manbhum. It has also to be remembered that practices of the Bhuiyans of this district do not materially differ from the Bhuiyans of the other districts such as Gaya and Hazaribagh where they are to be found in sufficient number. The only distinction seems to be that the local Bhuiyans worship the deity *Dewan Saheb* which is not worshipped elsewhere. In spite of all these tendencies the Bhuiyan and Ghatwars both continue to be depressed and the general admittance into a higher status has not been accorded to them in the Hindu fold.

MALLIKS.

We have now to take into consideration another caste of Mongolo-Dravidian origin which seems to have had a tribal origin. They are the Malliks. They are mostly to be found in the Jorapokhar, Sindri and Jharia *thanas*. According to Mr. Gait they can be connected with the Malpaharias of the Santhal Parganas. According to one of the traditions prevalent amongst the caste it is held that the zamindari of Pandra in *thana* Nirsa belonged to Malliks who had been driven away and defeated by a member of the Tundi family. The Malliks have been Hinduised though traces of totemism are still to be found amongst them, and they have the same totem '*Patrishi*'. Along with the *Kali*, *Mansa* and other Hindu Gods they worship Gods which are not known to Hinduism such as *Baghoot*, *Maya*, *Babiari*, *Thuiaha* and *Manangiri* and to these deities offerings of fowls, goats and sheep are made. It is only when the Sun God which is called *Bhagwan* is worshipped in every five years, the Malliks would seek the offices of a degraded Brahmin and in other festivals their own priest the *Layas* or even themselves make the offerings. In marriages and *Sradh* the offices of the Brahmin priest are called. In their food habits excepting beef they take every kind of meat but not that of the rats or the vermins. They consider themselves to be higher in rank than Hari and Dom and would not take food cooked by them but they have no objection to take food from any higher caste and readily take food cooked by a Bhuiyan. There seem to be no sub-sects amongst them. The only other sect which they themselves name is Rajbanshi Mallik and in contradiction call themselves 'Deobanshi Mallik'.

MAHULIS.

There is another class which has to be considered. These are Mahulis which speak a dialect akin to that of the Santhals. It seems to be very probable that they are of a branch of the Santhal tribe who adopted Hinduism and forced themselves into the Hindu fold. Their general occupation is basket-making and working in bamboos.

They have traces left in their society which make them identifiable with the Santhals with whose language their dialect shows great similarity. Though they have adopted Hinduism and worship *Kali*, *Mansa* and other deities, *Marang Buru* by the name of *Barpahar* is still one of their favourite deities. They have, however, no tribal village system nor are their marital laws quite similar to that of a Santhal. Cut off from their moorings they have depressed themselves and are regarded not much better in class than the Dom who work on bamboos in other parts of India. They do not have much of the intense pride of their caste as the Santhal has though their drink habit is quite the same as that of the Santhal. Laxity in sexual habit is also noticeable just as is the case with Bauris.

TURIS.

The Turi who generally used to adopt the profession of drummers and instrument men are another set of depressed classes within the Hindu fold who need some consideration. They divide themselves in this district into Maghaya Turi and Bangla Turi indicating that quite a lot of them are settlers from the eastern Magha (district of Hazaribagh, Gaya and Patna) country while the other variety is the Bengal variety of the caste. Which is the more indigenous is difficult to say at present nor can they be easily distinguished by their language. One would have the natural impression that the Bangla Turi speaks the Bengal dialect while the Maghya will speak the *Khotla Bangla*. But this is not so in all cases. The persons known as Bengali Turi use the Maghaya patoi which according to Grierson is a corrupt form of Maghi largely interspersed with Bengali so that it has come to have an opposite name *Khotla Bangla*. Both kinds of Turi speak almost the same language in some localities. They are probably distinguished from each other in accordance with the affinities they hold towards Bengal or the western countries. The distinction has not vanished even at present and no inter-marriage usually takes place amongst the two sets of Turis. But in some cases inter-marriage has been recorded. There is a tradition that the Turi originally belonged to higher caste but one of their members in a conclave of good people polluted himself, by touching with his teeth, the leather ties connecting two pieces to drum cover, in order to tighten the drum and make it ready for playing. From that day onward the caste became depressed and lost all grace and *Badala* and *Sadala* the two originators of Bengal and Maghaya Turis were treated as outcaste. The Turis generally took to drum beating and the profession of playing on instrument like drums. It is said that the Maghaya variety would not touch anything except big drum while the Bengali variety will play upon the small drums. There is some laxity of sexual habits in Turi women but they do not like the Bauris admit into their caste any paramour of their women on a caste feast being given. The Turi in one sense takes pride in his low origin and do great reverence to other castes and would consider it a sin to the caste itself, if they have to offer

food to a high caste man. The son of a Turi concubine, however, is admitted to the caste but with this reservation that he will be considered to be an illegitimate son of a Turi girl. They are not accepted with the grace with which a Bauri admits the sons of a concubine into his fold.

In his religion the Turi is a Hindu who worships all the deities of the Hindu pantheon but Kudra of the aboriginals variously known as Besaichandi, Kumrashine or Khelachandi is worshipped with the same reverence as the Bauri or a Mallik worshipping it. *Baghut* or *Bakaipahari* is another favourite deity. Offerings to these deities are made by the *Layas* who may be of this caste or any other caste in the village who have a reverence for these deities. It may be conjectured from these circumstances that the Turis are aboriginals who have forced themselves into the Hindu fold and the specially local deities worshipped by them.

HIGHER CASTES.

So far as the higher Hindu castes are concerned the more indigenous of them present the notable feature of dividing themselves into Bengali and Paschima, though not much of the difference is kept in the patois they speak in some cases except in the very highest classes. In the highest classes such as Brahmins and Kayasthas difference in languages is noticeable. While the Paschima or Maghaya Brahmins take to the patois of *Khotta Bangla*, the more indigenous Bengali Brahmins speak Manbhum patois with its peculiar intonations at their homes. It will be noteworthy that if those using *Khotta Bangla* have to use a language instead of a patois they take more easily to Bengali than Hindi which they speak very indifferently. In the classes lower than the Brahmin and Kayasthas both Maghaya and the Bengali caste use the *Khotta Bangla* tongue as common language and both take to Bengali with greater ease, when they have to take recourse to a language, than they take to Hindi. It may however, be mentioned that the speaking of indifferent and incorrect Hindi is the characteristic of all people speaking Maghi tongue in whatever form it is spoken in different districts.

BRAHMINS.

The Bengal variety of Brahmins which has grown almost indigenous by their long association and settlement in this district are as usual divided into *Gains* and *Gotras*. The most prominent amongst them being the Bando, Chatto, Mukhuti and Roy groups of *Gains*. Due to peculiar environments they sometimes have adopted title of Deoghoria, Mahatha, Mani though the original *Gains* seems to have been one of Bando, Chatto, Mukhuti, Roy or Ghosal groups. In comparatively earlier times the ideas of Kulinism were prevalent and practice of hypergamy was very much extant. It was not unusual to

find Kulin Brahmin of Bando, Chatto or Mukhuti groups with several wives because of their high status in the Kulin world. At the present, however, kulinism has completely disappeared, in spite of the fact that this district continues to be backward and conservative in comparison to other surrounding. Amongst the settlers from the west are *Ojhas*, Pandeyes, Tewaris who call themselves either Kanouji or Maithili but they differ greatly in habits and customs from the parent stock and adopted many Bengali virtues and vices of the area.

It may be said that of the two classes of Brahmins the Bengal Brahmins are more naturalised to the soil than migrants from the West and North. Their period of stay in the district has certainly been longer than those of Kanouji and the Tirhuti Brahmins. It is almost agreed that they are more recent immigrants to this part of the country than the Bengal Brahmins. As a result, amongst the Brahmins, the Bengal Brahmins are more influential in every walk of life than the Tirhuti or Kanouji Brahmins whose importance is maintained by their holding lands and tenures. In intellectual callings the Bengali Brahmins predominate and it is more often than not that the intellectual leader of the village community is the Bengali Brahmin rather than the Kanouji or Tirhuti Brahmin. As to the proportionate number no definite census is available but it may be ventured that they can be found almost in equal numbers.

KAYASTHAS AND RAJPUTS.

If we exclude those that have within the last 50 years migrated to this place, the exclusive class to be found amongst the Kayasthas is the Bengali Kayasthas who have become more or less indigent to the soil. As usual they are organised in the same fashion as the Kayasthas of Bengal into Kulin and Maulik groups. The first bear the titles Ghosh, Bose and Mitra, while all the rest such as Sen, Roy, Dutta and most of others (72 in number) being used by those called Mauliks. In recent years there has been a considerable migration of Kayasthas from Bihar but the local Kayasthas may be said to hold their own against the migrants in influence. How long this will continue is very difficult to say. In villages the migrant Kayasthas seem to have no influence and except three or four well-to-do and well known houses not many are known. There are, however, many Bengal Kayasthas who are well off in the villages. In the towns like Dhanbad the Kayasthas of both variety seem to have equal influence for most of those who live in towns are in connection with some profession or calling and are economically well off. It may be said that the Brahmins and Kayasthas dominate the intellectual life of the district and have occupied the highest places and highest callings in the area. In the Behari Kayastha group both the Ambasta and Srivastava are to be found. The local Rajputs differ greatly in physique and habits from their brethren of other area. They wear the Manbhum look and are short and puny in stature and can be distinguished very easily from their brethren of the north

and west. They have not the sturdy physical frame or the resistant outlook of their northern and western brethren. An opinion may be hazarded but cannot be supported that many of the so called Rajputs are accession to the caste from the aboriginal fold. Most of the Rajputs are occupied in lands for the cultivation of which they employ labourers. They do not touch the plough themselves like their northern or western brethren. There is one trait common which is the great shortage of women amongst the caste. This is probably due to the neglect and want of care for the Rajput females, which was the characteristic of the entire caste in India. At one time this caste throughout India used to practice female infanticide en masse and females after birth were exposed to inclement weather or allowed to die by starvation or some such means. The result has been a great shortage of women. Though infanticide has practically been stopped, at present the local Rajputs find it difficult to procure a wife amongst their caste and have to pay heavily for it. He has of necessity take a woman of other caste with the result that what is now Rajput caste here is a somewhat hybrid of aboriginals with certain percentage of real Rajput blood in him. This, of course, cannot be applied to all of them.

KULUS.

The other caste of higher Hindu order are mostly of occupational types such as Kulu, whose general occupation was oil pressing, Sumandal the wine sellers, Tanti, Kamar and Kumhar (potter). Each of these castes in this district is sub-divided into Maghaya and Bangla and mention may be made of a few only in this connection. Telis and the Kulu are divided into Maghaya Telis and Bengali Telis. The Maghaya branch is called Teli Mahato while the Bengali branch are Gorains. Teli Mahatos can be found throughout the subdivision but the Gorains are generally found at Govindapur, Nirsā and Chirkunda *thanas* and are not to be found in any great number elsewhere. The two sets do not generally inter-marry. The Maghaya Telis who seem to be more indigenous permit divorce and re-marriage of widows while Bengali Telis or Gorains consider themselves to be of higher order and do not permit this. In recent years there have been some inter-marriages between the two sets but generally Bengali Kulus who bear title of Gorain would not consent to marry into a family of Maghaya Teli who according to them have separate customs.

SUMANDAL.

The Sumandals who can be found throughout the district are again divided into two classes, the Bengali variety of 'Suris' and the local variety or Maghaya variety. The Bengali variety do not permit divorce or re-marriage of widows and consider them to be belonging to a higher group of caste which forbid this. The other two sets the Maghaya and Bhadreka allow divorce and re-marriages of their widows and differ materially on this aspect from Bengali Sumandals.

At one time wine selling was one of their chief occupations but at present the grog shops being under strict control by the Government they have not got the monopoly and ceased to be an occupational caste. They have now taken mostly to cultivation and in some cases they earn their living as a day labourer.

In the case of Telis the Bengali variety has superiority over the Maghaya group who probably are more numerous than the Gorains. In Nirsa, Chirkunda and Baliapur *thanas* the Gorains have great influence and are big landholders or business men of considerable importance. They have a place of pride in the district which their less fortunate brethren the Maghayas do not enjoy. This is not so in the case of Sumandals who at the present time are mostly cultivators or day labourers. Neither the Bengali nor Maghaya nor Bhadreka variety has any predominance over the other.

GOALAS.

The Goalas similarly are divided into Bengali variety and Maghaya variety. The Maghaya one is similar to the Kishanaut and the Mangrant group of Goalas of eastern Magha. The Goalas of another variety called Ghasi mostly belong to the Bengal variety. It seems that there has been a considerable accession of aboriginal people into this caste. Some aboriginals like Santhals by reason of their tending cattle have forced themselves in this fold by marriage or by process of slow absorption. At one time cultivation and cattle tending seem to have been the general occupation. The touch of the aboriginal is found in the local Goalas by his reverence to spirit such as *Kuaru* and *Baghoot* which are distinctly aboriginal deities. In case of Goalas, however, no fowls are offered to the *Baghut* a deity who is said to be a spirit protecting the cattle from the attack of tigers and wild beasts while the aboriginals would offer fowls to that deity. The Goalas will, however, offer only goats and often a she-goat as a sacrifice to this spirit. The worship of *Kunar* in the month of *Asarh* is regarded as indispensable by Kishanaut Goalas in this area.

KAMAR.

So far as the Kamars are concerned there is a class who call themselves as Maghiya Kamars as opposed to Bangali Kamar. It must be remembered that caste in its origin seems to have had an occupational basis like guilds of medieval Europe. So long as the caste system retained its occupational character it was somewhat easy to admit into it any persons belonging to occupation of the category which was pursued by the caste in question. Even when caste tended to go by birth this was not altogether impossible and occupations sometimes resulted in absorption into a caste fold persons who did not by birth belong to it. Maghiya Kamar as distinguished from all other Kamars seemed to have been a sect of this nature. At present they follow the creed of Hinduism and are not depressed

but they still retain some traces of aboriginal religious system in their performance. As usual the *Baghut* is worshipped by this sect while those call themselves as Bengali Kamar do not adhere to it. 'Biswa Karma' of the Hindu pantheon is a special object of reverence amongst all.

BAISNAV OR GOSSAIN.

Besides these characteristic occupational castes which seem in the present time to have lost the occupational basis owing to the disruption of the age old village system that was in force even for some time after the advent of the British there are other castes of a different nature. These castes have been formed by a peculiar process and are amalgamation of many castes following a particular tenet of Hindu religion. Thus the *baishnabas* who seemed in the earlier stages to have been drawn from all castes professing adherence of a particular religious formula crystallised into a caste in later times called the *Jatbaishnab*. In the earlier stages members of this community might have belonged to Brahmins, Kshatriya or Baisya communities who professed the same set of religious ideas such as non-adherence to the caste rules, for the God who made them was one. This rule itself was so strictly enforced, the tenet so sedulously observed and non-observance was so promptly punished, that conversion of the whole sect professing the same religious ideas into a well formed caste by birth became only a question of time. It is in this way that the caste which we call *Jatbaishnab* or Gossain or *Yugi* seems to have sprung up and quite a number of them are to be found in this district. The Gossains are divided into four classes, all endogamous, namely, Ramit, Krishnait, Madhya-achari and Krishna-achari. They all abstain from animal food and as a subsidiary profession they take disciples from the lower castes. The original conception of absence of 'no touchism' upon which the caste was based has been lost and at the present day none belonging to this caste would consent to touch rice cooked by any lower caste than themselves though they have no objection in taking food cooked by the Brahmins or the Kayasthas.

BABHANS.

We have also to consider another Indo-Aryan group in this connection who are comparatively recent migrants in this district, though by long habitation they have become indigenous to this district. They do not differ much in physical characteristics from their counterparts in North Bihar and have the same traits, the same attachment to land, and the same tenacity of purpose to retain lands in possession though by local influence all these characteristics have been greatly modified. The trait that is important, is that many of their customs have been modified by the compulsion of their surroundings. It would be sacrilege for a Babhan of North Bihar to cut even decent jokes with a grand-daughter on her love affairs with her husband. But like the Bengali grandfather the local Babhan

would not scruple to do so provided the limit of decency is not crossed. The '*Ulu*' during the marriage by the females which is common amongst the Bengali castes has also been adopted by these Babhans who undoubtedly have migrated from North-West. Ordinarily all the Babhans in the North and West would feed a bridegroom's party at least for three days during the performance of the marriage ceremony but the Babhans of this area generally adopt the Bengali custom of entertaining the bridegroom's party for a day and the distinction between the '*Kachchi*' and '*Pakki*' so punctiliously observed in North Bihar or elsewhere is not observed here. There are some other castes of occupational nature such as the *Napit*, *Kumhar*, *Rajak*. The only mentionable fact about them is that they follow more the Bengali pattern and in villages still stick more prominently to their occupation than any other caste. Many of them have, however, taken up other occupations than their caste occupation but still they continue to be more attached to their caste progress than the other caste. The *Rawani Kahars* of the area has one distinction from the Bihar contingent. They do not like their brethren claim a Kshatriya status and agitate for being termed Chandra-Vansi Kshatriya. They are content only to drop the *Kahar* and call themselves *Rawanis* instead.

It may be mentioned that amongst the higher castes as detailed above there is still a certain rigidity and no touchism. In the villages a Brahmin would affect not to take food touched by the caste lower than the Brahmins. The Kayasthas similarly would not openly take food from any other caste except the Brahmins or Kayasthas. Some regard is still paid whether the caste is one whose touch does not pollute the water by the higher caste. But how the influence of caste system is gradually dwindling will be shown later.

As for the Muslims who form $12\frac{1}{2}$ per cent of population of this district, very few can be said to have an indigenous character. Their large percentage (being $12\frac{1}{2}$ per cent) is accounted for by migration into the district from outside, in the industrial areas. They have no special features to distinguish them from the Muslims of other parts. The indigenous Muslims were very poor and except at Govindpur they had not even a mosque to their credit for a long time in the rural areas nor have they wielded any great influence in any locality. It is only in the towns like Dhanbad, Katras and Jharia that mosques have come to be built by influential Muslims who have settled here from outside. The local Muslims speak the Maghya dialogue and in many cases Bengali tongue while those who have come from outside have Urdu as their mother-tongue. The migrants outnumber the local population.

CHRISTIANS.

The Christians form an insignificant part in the people being only 4 per cent. A mission was established at Pokhuria in Tundi thana in the late nineteenth century and did some solid work

for betterment and uplift of the aboriginals in the area. It has gained some converts from the aboriginal rank and wielded some influence in the area. The other Christians are concentrated in Dhanbad and Jharia being mostly foreigners, Europeans and Anglo-Indians in the Railway colony. A few of them are Indian Christians.

OTHERS.

For the last 50 years Dhanbad has gained in population by migration from outside. A great number of these migrants have adopted the district as their home but it can be safely said that they have not acquired as yet an indigenous character and retained their own characteristic of the district from which they have migrated. In the coalfield areas there is continual influx of population from Uttar Pradesh and the districts of Hazaribagh, Gaya and Monghyr. Of all the districts in the North and Central Bihar who have sent out their population to this district Hazaribagh stands first. Gaya stands second having sent out 34,226 and Monghyr a close 3rd having sent out 31,915. All these persons belong to various groups in their original homes and they need not be considered separately. Most of them concentrated themselves into the coalfield areas and it is not unoften that a batch of persons belonging to the same caste come to be allotted residence in the coalfields which go by the name of their caste. Thus we have the *Pasi Dhowras* indicating the *Pasis* were accommodated or *Dusad Dhowras* or *Beldar Dhowras*. The *Beldars*, it may, however, be mentioned, though migrants from other districts and expert at earth cutting, have replaced the indigenous Koras, and have made the district their home. Near about Dhanbad quite a large number of them have settled for more than two to three generations. They are acquiring an indigenous character though they were not so in the beginning of the century.

The characteristics of the migrants who have come within a century need not be mentioned here. A great number of castes that are at present to be found and have been enumerated in the district in the last census are therefore omitted out of consideration. They have no special features and do not differ much from their counterparts of the districts from which they have migrated. No doubt in time they will begin to contribute greatly to the culture and progress of the district but it is not yet time to assess their contribution in moulding and shaping the local culture.

MARRIAGE AND SEX RELATIONSHIP.

Marriage by Purchase.

It will be interesting to note the peculiar marriage custom prevalent in the district. The system of marriage and relationship between the sex is an important factor through which the culture of the people can be understood. As a rule marriages are by purchase. Either the bridegroom or the bride has to be paid for. It has to be

noted that like all other parts of India marriage of the females is almost universal though it may sometimes happen that a male might remain unmarried. Even this is not a possibility for the eastern mind regards single living almost as a sin and Dhanbad is not an exception to the rule. It has been found that quite a large proportion of the population being more than 50 per cent of the Hindus belong to the Depressed Class, Scheduled Tribes or Scheduled Castes. Of the 12 per cent of the Muslim again more than 80 per cent have very low status in the society and are day labourers or persons of small income groups. A close study reveals that the purchase of brides is more common in the local population than the purchase of the groom as have the economic affluence to maintain a wife without her having to work for the family. In a nutshell it can be formulated that wherever the question is to add to labour force of the family the bride has to be purchased but where the addition to the family means an additional encumbrance and the corresponding gain to a party to part with the girl the bridegroom has to be purchased. Thus even in lower classes where the usual rule is to purchase the bride, the bridegroom is sometimes purchased if he is found to be in affluent circumstances and in no necessity to add to the labour force in his family. Thus amongst the Sumandals, Ghatwals, Gossains, Malliks and all other lower castes the rule is that the bride should be paid for but even amongst them a bridegroom particularly in affluence circumstances is paid for and dowry is given to him rather than to the bride. Amongst the Santhals there is a fixed bride price which may be either Rs. 3, Rs. 6 or Rs. 9 in addition to something more which has to be paid to the father of the bride but this rule is only observed in a formal way and an affluent Santhal bridegroom is run after by many prospective brides and their guardians. The same tendency is noticeable amongst the Mahatos who have to pay for the bride rather than the bridegroom.

Amongst the higher castes like Kayasthas, Brahmins and Baisyas the rule is quite the reverse. The females do not become helpful so far as income making is concerned, and are liabilities that way, and except for keeping the family their economic value as potential earning members is almost nil. The result is that an affluent home has to be purchased for the girl of those classes and the bridegroom price in the shape of dowry often ranges up to Rs. 10,000 to Rs. 20,000. The minimum to be paid for a bridegroom is not fixed but it has never been known to have been less than Rs. 100 and that too if the social position of the bridegroom is insignificant.

Amongst the Babhans or Bhumihaar who regard themselves as twice born class the main expenditure in the family is in marriage and *Sradh*. This is common to all the Babhans of Bihar and Babhans of this district is not an exception to the rule. The *Tilak* in cases of daughter's marriage sometimes accounts for more than half the

savings of the family and otherwise a thrifty Bhumihar finds himself in an inconveniently tight corner if he has a number of daughters to give away in marriage.*

The earlier remarks might indicate that wherever the class is higher caste and is in affluent circumstances the bridegroom has to be purchased while the labouring class has to pay for the bride. There are, however exceptions to these rules. Amongst the Rajputs there is a paucity of females and the rule is to purchase the bride and no bridegroom price is usually paid. It is not unoften that a particularly good looking girl in Kayastha and Brahmin family is taken for no price and in a few cases the entire expenses of the marriage are borne by the bridegroom's party in consideration of the looks and family tradition of a suitable bride. Amongst the Maithili Brahmin the rule is to purchase the bride and a Maithil in this part like any other parts, has sometimes to wait till the end of his youth to amass enough money to purchase a bride.

Early Marriages and Age of Marriage.

Except amongst the higher caste where economic consideration has played a great part, pre-puberty marriage is the general rule. This involves two ceremonies, one a regular marriage and the other when the girl attains puberty and able to lead a sexual life and is taken home to her husband's place. Both the bride and the bridegroom are married at ages before puberty. The bride remains at her father's place till she attains puberty. On her attaining maturity an information is sent to the husband who then takes her away to live with his people. Ceremonies involving expenses have to be performed on both the occasions though the second ceremony is less important and is known as '*Roksati*' or '*Dwiragaman*'. Amongst the very lowest classes both adult and infant marriage are in vogue. But parties of higher rank than the very lowest such as Baishnabs, Gwalas, Kamars, Sumandals are generally married at an age before puberty. The Santhal and Kurmi generally married their girls after attainment of puberty but in recent times they have begun to marry their girls young probably under the idea that this is more honourable, being followed by a large number of Hindu castes. It may be mentioned that the Sarda Act had little influence because of its ineffective provisions and amongst the classes who live by labour the general rule is to marry their daughters and sons much before the age of maturity. Child marriage was probably the invention of the higher caste Hindus who wanted to ensure the chastity of their girl and purity of their boys by marrying them before they had learnt anything about sexual secrets. But it was they who put in the Sarda Bill finding the baneful effects of the child marriage. The economic condition of the present age more than the Sarda Act has resulted in practical abolition of the child marriage amongst the

*There are reasons to believe that in spite of the Anti-Dowry Act the prosecution of Tilak has gone underground and the incidence has not abated. (P.C. R.C.).

higher castes. It is not possible to find a suitable groom of tender age who could be married to very young daughter of a family. As the age of the groom grows the brides have to wait for a long period after they have attained maturity, till a suitable groom could be found for her. This has resulted in raising the age of the girl of higher castes and it is unthinkable at present moment that any one belonging to the higher caste would think of his daughter's marriage till she has attained the age of 14.

The lower caste, however, is free from this disability. The economic consideration which hampers the higher castes from marrying their daughters early is not present with the lower caste. At any rate all their boys and girls have to labour either in the fields, or have to procure some occupation, with the result that it matters little whether the boy is well posted in his childhood or not. It becomes almost axiomatic that the boy will take to some kind of physical labour to earn his livelihood.

Endogamy and Exogamy.

Marriage in the tract is endogamous within the tribe or caste. Marriages generally take place within the tribe or the caste to which a man and woman belong. But in certain tribes and castes the rule of exogamy between the sub-caste is very strictly adhered. Thus the Santhals who are divided into 13 sub-septs each following a totem consider the totem as taboo and do not marry within the sub-sept. A Soren would not marry a Soren and must find out a bride from the other twelve sub-tribes. This is so also with the Mahatos. A Korebar Mahato must find a bride in any other sub-tribe than the Korebar. The marriage within the sub-sept is absolutely forbidden. This rule of exogamy in sub-tribes is not adhered to in cases of many other castes. The Singh Ghatwars though of an aboriginal origin would marry a Singh rather than a Roy Ghatwar. Nor is the rule of exogamy prevalent amongst the Bauri sub-tribes. The Malliks have no sub-tribe and there is no rule of exogamy in them, except that a Mallik would not consent to take a wife from any other caste. As it has been pointed out earlier that many of the castes are divided in Maghaya and Bengali. The Turi, Dome, Kamar, Kumhar, and Teli and such other occupational castes are endogamous. The Maghaya variety generally do not intermarry with Bengali variety and intermarriage between these two endogamous groups takes place as exceptions and not as a rule.

Amongst the higher castes like Brahmins and Kayasthas the rule is endogamy within the caste but exogamy so far as the Gotras and Goins are concerned. Thus it can be said that like the Santhals there is both exogamy and endogamy prevalent in these higher castes. Amongst the Muslims there is no fixed rule of exogamy or endogamy. The only prohibition being that a Muslim must marry a Kitabia or a person following a religion which is based on a revealed book. This forbids marriage with a Hindu or any other

aboriginal tribe. But the Muslim can without impunity perform a marriage with any other person who converts himself or herself into a Muslim. No rule of exogamy or endogamy prevent any person on the earth provided he or she takes to a religion based on a revealed book. In practice, however, a Muslim marries a Muslim subject to only such rules of prohibited degrees as are enjoined by the Muhammadan laws.

Polygamy and Hypergamy.

Polygamy was permitted in law to all kinds of people in this area but in practice except by the most affluent classes like the zamindars and big landholders polygamy is seldom resorted to. It has been resorted to by less wealthy classes in case the wife proves barren. At one time amongst the Brahmins the system of 'Kulinism' and a system of hypergamy was prevalent by which a particular Brahmin regarded as having been of high birth was sought after by a number of girls. For the rule was that to preserve one's own status in a society the girl of a good family will have to be married to a *Naikashya Kulin* or a person belonging to a higher status. The result was that there was a great rush for a single groom of this type and the groom had simply to oblige the father-in-law by performing a sort of ceremonial marriage though he might almost be incapable of performing the duties of the marriage in the true sense. The *Kula* of the girl was thus maintained. Marriage was made a lucrative profession, but this practice has fallen into disuse and is no longer in vogue. This kind of hypergamy marriage which resulted in polygamous marriages of no consequence, is not to be found in this area at present. It has practically disappeared from the province of its origin. The present Kulinism of Bengal is confined to this only, that there is a restriction of giving the girl of a Kulin Brahmin, to any but a Kulin while there is no restriction for the Brahmin bridegroom to marry any other than the Kulin. A Kulin Brahmin can take as his wife from any other Brahmin provided he is not of his own *gotra*. But in case of the daughters, a person of higher status has to be sought out if the daughter's father wants to maintain his own status. Even so this rule has considerably been relaxed and no such fastidiousness at the present day is shown provided the economic affluence of the bridegroom is assured.

Amongst the Kulin Kayasthas the restriction is quite otherwise. The eldest son of a Kulin Kayastha has to marry a Kulin if the purity of the *kula* of the family has to be maintained. This restriction is not placed on the younger sons of the family. The eldest son of either Ghosh, Bose or Mitra is thus placed at disadvantage. The eldest son of a Mitra has to marry a Bose, or Ghosh girl. This rule is now observed more in breach even in this conservative locality. The Brahmins, however, tries to stick to the old principles in the locality with more tenacity than the Kayasthas of the area.

Polyandry.

No instance of polyandry as such is to be found in this area. It was prevalent in some parts of India till late but gradually it became extinct. Polyandry is a direct result of matriarchy. It is natural when descent is traced through the mother and property devolve through her relationship, that the females will have a prominence in the family. It is they who look to husband and often as many husbands as it would suit their choice to take. In earliest stage of society which seems to have been *matriarchal*, naturally the right to property devolved through the females who formed the centre of the family and usually the rule seems to have been for males to visit the females in her own apartment. The father of a particular son born to any woman could not be determined in such society. From this state of free sexual relationship emerged the institution of polyandry in which the fathers belonged to the family and the fathership of the children came to be determined with the growth of more crystalised form of sexual relationship. It came to be like this that one single woman began to be claimed by a group of persons as their common wife who shared her between themselves. In many parts of India this custom was prevalent and probably is still in existence in Tehrigarwal area of Himachal Pradesh and in some places near Tibet.

Polyandry is still prevalent in some parts of northern India. A number of brothers share between themselves one wife, the eldest of them having a little privilege. If any one of the brothers wants to set up a family of his own he takes a second girl as his wife but in such cases it remains open to the brothers younger to him to remain with the eldest or to go along the one who takes in another girl. This kind of polyandry is not found in this tract amongst any of the tribes. But Santhals have amongst them a custom by which the younger brother of the husband is allowed the use of the person of his elder brother's wife, provided it is not too open. In case such liaison is known it is forgiven as being only natural. This right of the *debar* on the elder brother's wife is reminiscent of fraternal polyandry. In her turn the wife may bring his younger sister and allow the enjoyment of her person by her husband. If pregnancy results a marriage is performed and no social stigma attaches to such liaison. This practice is also reminiscent of a community form of marriage in which one whole set of girls of a community is married to the whole set of another.

Levirate.

Levirate or raising the seeds through another person than the husband because of some incapacity has become outmoded. It was recognised by the ancient Hindu scriptures but any man or woman taking to this devise of raising offsprings to themselves will be looked down upon in the society both in the higher and the lower castes. During our close enquiry none of our informants belonging

to several castes could be made to admit that such a practice amongst them exist though necessity of having an offspring who would perform their *sradh* or the religious ablutions for the uplift of the departed soul was considered to be imperative not only amongst the Hindu castes but also by the aboriginals.

Except amongst the Muslims the rule is to place all near relatives to a prohibited degree. Neither the tribals nor any of the Hindu castes tolerate the marriage between the cousins in this area. The Malliks who are considered to be of very low caste consider their cousins to be within the prohibited degree but in case of Malliks the rule is rigid so far as the first cousins are concerned. The distant cousins may intermarry but care is taken to see that the relationship is sufficiently distant. In some parts of India cross cousin marriages are permitted amongst the Hindus and even marriages between maternal uncle and the niece is not ruled out, but such relationship cannot be thought of even amongst these tribals in the area what to speak of the Hindus. Cousin marriages are prevalent, however, amongst the Muslims as it is throughout India and throughout the Muslim world. One would think that marriage between the sons and daughters of two cousins of the opposite sex would not be ruled out amongst the Santhals for they necessarily would belong to two different '*Paris*' but the Santhals also prohibit such marriage.

Communism and Illegitimacy.

Amongst the tribals like the Santhals who are habitually not incontinent in sex matters premarital communism prevails. It would not be much of a crime to have a sexual intercourse with an unmarried girl and if pregnancy results by such intercourse, the putative father is found out and the girl is married to him. It is not unoften that in festivals like *Soharai* and *Sarhul* boys and girls freely mix with each other and come to have liaison which in other castes and tribes may be considered to be illicit. The Santhals do not recognise any such conduct as illicit it being accepted that if pregnancy results from such conduct the putative father will accept the prospective mother as his bride. This protects the Santhal women from being thrown out of caste for conduct like this which other castes in the locality will punish by ostracism. As stated above the prohibition observed amongst the Santhals is that a sexual relationship should not take place between a girl and a boy of the same sub-tribe or family, for marriages in such cases are prohibited. But even when such an occurrence takes place the Santhal tries to find out a means by which to retain the girl within their fold. If an incest of the nature has occurred and the putative father be detected to be one to belong to the same sept as that of the girl, some one of a different sept is found out by the *Manjhi* the guardian of the morals. A fine which may be considered to be heavy is levied upon the putative father. He has to pay a bullock, some grains to the person willing to take the

prospective mother as wife. Some lands are also made to be given in compensation to the young man upon which regular '*Bapla*' or marriage is performed between the two and the child is legitimised. The various forms of marriage prevalent amongst the Santhals indicate their healthy outlook on sexual relationship. If a girl is desirous of a groom she might just enter into his house with an intention to live with him. In such cases the boy's relatives or the boy may not like the girl to be in his house but courtesy requires that no force should be used to turn her out of the house. What is usually done is that the mother-in-law or any relatives living with the groom will put some dry chillies in fire and create hot smokes in the room for several days where the girl takes up her abode. If she can remain within it in spite of this for more than three days her right to be in the family is accepted. This is what is known '*Nir-bolok*' (bolok means to enter) form of marriage which is as valid as the other forms prevalent amongst the Santhals. A young man similarly can have a girl of his own choice by smearing her forehead with vermilion in an open place in the *bazar* and then running away followed and chased by the relatives of the bride. In such cases what happens is that the bride's party approach the relatives of the bridegroom and demand from him twice the bride price, a goat or a sheep for feasting and it is not unoften that the bridegroom has to stand severe thrashing and fight it out with the bride's party. Whatever that may be, the mere act of putting the vermilion creates a relationship and unless a divorce is made the girl cannot marry elsewhere. The regular marriages or *Bapla* is then performed according to all ceremonials. One of the ways of disposing of the girl with deformities is to purchase the bridegroom though the general rule is to purchase the bride. In some cases the *ghardi Jawain* form of marriage is resorted to by which the son-in-law comes to live with his father-in-law because he has no male issue to whom the properties could devolve and it must be remembered that according to the Santhal tribal custom the females have no right to inherit. It will be seen from the above account that the Santhals practically eliminate illegitimacy from their tribe but they are too solicitous of their women's honour when *Dikus* or non-Santhals are concerned. It will be sacrilege for a Santhal girl to run away with any one who is not a Santhal and in such cases she is socially ostracized and turned out of the Santhal fold. There have often been cases in the Santhal Parganas though not in this district where the '*Bitlaha*' or *Santhal* form of ostracism is taken resort to.* The entire family of the Santhal from which a girl has run away with a foreigner is ostracised violently. The rule in the *Pargana* is to notify the intention to perform *Bitlaha* over a particular person before a Magistrate and a Magistrate is usually deputed to see that the rowdyism committed during the procedure does not cross the limits prescribed by laws. Usually the whole conclave of Santhals turn up, break

*See also the rewritten District Gazetteer of Santhal Parganas (P. C. R. C.).

down the utensils, and smear the entire house with night-soil and cowdung. The inmates who are given previous information are usually out and though this act may be performed for any other default is mostly done where a Santhal girl has run away with man of other tribes or castes. In this part this form of ostracism for crimes of this nature is becoming extinct and even the Santhals seem to have lost something of their solicitousness for their women kind.

After a Santhal has been married they lead a chaste life and are generally attached to their spouse. The child marriages are becoming extinct which prevents the prevalence of premarital communism as stated above.

The other classes which seem to practise a sort of communism after marriage though not openly and by legal sanction are the Bauris, Malliks and Mahulis.

Both the Bauris and the Mallik women are lax in their sexual habits and Bauri women most frequently live in unashamed concubinage without incurring any social odium from the caste. In some cases the paramour may be a non-Bauri or a non-Mallik. The children who are the results of such liaison cannot be regarded as legitimate. Nevertheless no social stigma for the illegitimacy attaches to them, it being almost accepted by the whole caste or tribe that such things are only common in the caste. Bauri women often decoy other persons belonging to other castes and who have been ostracised for taking food cooked by their mistresses, into their own castes. The problem of illegitimacy which is solved by the Santhal by a different way indicated above does not exist in any acute form amongst this lower caste, it being practically accepted by the caste that being an illegitimate son is of no social importance. Amongst the higher castes of the *Sudra* group such laxity in the sexual morals more or less is absent and cases of laxity if disclosed are punished by ostracism of the girl though the male escapes, and illegitimacy presents a great problem. Secrecy in the illicit liaison is, therefore, the rule amongst these classes. The degree of it may vary according to the status which this caste occupies in the Hindu ladder. Amongst the very highest classes like the Brahmins, and the Kayasthas the rule is extremely rigid while as we get down lower and lower it gets gradually relaxed till amongst the Bauris and Malliks both premarital and post-marital communism of a *de facto* nature is allowed to prevail.

Divorce.

Amongst the Hindus marriage is a sacrament and the very highest classes regard the person of the wife and the husband to be one and united after the marriages, so that even after the death of the husband the widow continues to represent the half of her husband. It was on this theory that the widow's estate was possessed by her till the recent amendment of the Hindu law. The spirit continues and amongst the higher classes the sacramental ties created

through the marriages could not be snapped by a divorce. Divorce is not therefore, prevalent amongst the higher classes. Amongst the *Sudras*, however, some of the occupational castes whose touch does not pollute water allow divorce. Thus the Maghaya Teli, Maghaya Kamar, Maghaya Kumhar, Kishnat, Maghait, Goalas, Maghaya Sumandal, Beldars and Rawanis and such other typical classes permit divorce. The Bengal variety of Sumandal, Kamar or Kumhar or even the Goalas prohibit it. Even the Bhuiyans who are of distinct aboriginal origin when they have raised themselves to the status of Ghatwars and have donned the sacred thread prohibit divorce while Bhuiyans still allow divorce. It will be plain that there is a tendency to look down upon the divorce and the Bengal variety of these castes do not consider it enough respectable to allow the spouse to be divorced. Absence of prevalence of divorce is regarded as a sign of purity of the caste and there is a tendency towards the abrogation of this social custom, even at a period when amongst the very highest classes there is a tendency towards permitting it in case the marriage proves a failure. Thus while there is in the upper strata of the society an attempt is being made to mitigate the hardship of the sacramental marriage enjoining a perpetual companionship with an undesirable person, in the lower strata there is a tendency of discarding the privilege that was already available to it. Amongst the tribals the Kurmi Mahato permits divorce and it is done by a simple ceremony before the Mahato and the village men. The Santhals announce their divorce by tearing *sal* leaf before the *Manjhis* and some persons of the village. The Turis and the Doms have the simple ceremony of dropping down some vermilion on the ground which the bride and the bridegroom picks up. That indicates the dissolution of the marriage before a few of the caste men. In some cases like the Teli Mahato, documents are drawn up. Amongst the Muslims divorce is also prevalent but in such cases the traditional Muslim rules have to be followed. As a rule the right to divorce where it is prevalent belongs to the husband. The female is neither known amongst the Hindus nor amongst the Muslims to exercise this right. By law the Muslim female has no right to divorce till she is permitted to do so by her husband, but in cases of tribal or Hindus where divorce is permitted there seems to be no written law prohibiting the female, but as a matter of custom the right to divorce seems to belong to the husband. The wife may signify the intention to divorce by running away from the husband but the actual breaking of marriage tie has to be done by the husband. A lot of difficulty can be created if the husband is unwilling to give up the wife and in case of lower caste Hindus, cases come up very frequently where the husband wants back his wife and the defence is put up that the husband has already divorced the wife. It is not unoften that some unscrupulous father would try to dissolve the marriage already performed and give his daughter in marriage with some other person in lieu of some money, and such allegations are very frequently made in Court cases. In the case of

divorce cases where purchase of bride is prevalent, the bride price has sometimes to be returned, where the divorce has resulted out of recalcitrants of the wife and her unwillingness to live with the husband. But in most cases it is the husband who divorces and the question of paying back the bride price to the groom does not arise. In some such cases a written document is given to the effect that nothing is due from the bride and all the ornaments given to the bride by the husband have been taken back. In some cases, however, where the husband is unwilling to give up the wife a claim is made even in courts for return of the ornaments and the bride price and all that had been paid to the bride as dowry.

Re-marriage of Females.

Re-marriages after divorce is permitted by all castes and tribes which permit divorce, and in such cases marriage is performed in *sanga* form which certainly has a less respect like that of the ordinary *biha* or *Bapla* as the Santhals call it. It goes without saying that in the caste which permit re-marriages and divorce, widow re-marriage is in vogue. Thus all the lower classes shown above and the depressed ones, the Santhals, and the Muslims and also the Christians permit widow re-marriage. Amongst the Santhals, however, there is superstition that the deceased husband retains a hold over the wife and may wreak a vengeance on the newly married one. In such cases what happens is that the boy is married first to a *Mahua* tree and then the regular *sanga* is performed, with the widow girl.

The Roy and Singh Ghatwars do not permit their widows to remarry nor does the Bengal variety of Sumandal Kulus, Kumhars and Goalas permit it. The Maghaya variety of these castes permits divorce and widow re-marriage. It goes without saying that upon the sacramental theory the widow re-marriage in spite of legislation continues to be a taboo and the idea of sacrament still continues in spite of hardship wrought by the prohibition. The higher castes still cling to it and do not allow re-marriage after the death of their first husband. Elsewhere in the bordering districts the prejudices are gradually giving way but in this part in spite of heavy industrialisation the so-called higher castes still cling to the old ideas and not many widow re-marriages are heard of even in recent times.

THE MIND OF THE DISTRICT AND IMPACT OF MODERN AGE ON THE PEOPLE—MANNERS AND CUSTOMS.

There is a theory that in India there are many races. Mr. Risely is of the opinion that people can be classed according to measurements into pure Dravidian, Mongolian and Indo-Aryan groups. If we keep the Indo-Aryan group at one end and the Dravidian and Mongolian on the other many will be found who have sprung from inter-mixture. Thus one approximating the Dravidian in look and measurement has lesser amount of Indo-Aryan blood and more of the Dravidians than others in whom the reverse may be the case.

This theory which was solely based on the anthropometry was later discountenanced as the result of the measurements which were never very accurate.

Another theory is that there is only one race in India created by mixture of races and influenced by the similar kind of climate and local environments. Both seem to have some validity. The local influence theory may be given a little more prominence than Risley's cut and dried race theory. Local environment creates a sameness of mental outlook and this is true in Dhanbad. The features also begin to wear the look of a particular locality though the variations continue. There is a certain kind of rugged look worn by the indigenous inhabitants of this district which distinguishes them from those of the others. A Brahmin may have somewhat sharp features and be fairer in complexion than a Mahato or a Santhal but the shrugged Dhanbad look cannot be missed in both of them. This is due to the local influence and environments and the climatic condition. There is also a similarity in outlook. A certain amount of backwardness ensues in spite of progress made in modern times.

Any one strolling by the countryside or even on a secluded road of a town like Dhanbad may watch vast tract of undulating fields almost melting away into the horizon, lit by the morose sunlight cast throughout the tract, sometimes deepening into the shades of a mysterious nature in the low lying ravines. This half shadow and half light are not only the mystery of physical nature here, but also of the inward mental make up of the district. There are many a back waters in the mind which one seems to understand, yet not perfectly. This is why a non-inhabitant of this district finds it difficult to get a contact and is exasperated by the truancy of the local mind and interprets it as an unwillingness to co-operate or to work together.

The fact is that nature here is rather unkind, sombre and even beautiful in some way. The wavy fields fringed with hillocks, often dreary, and unyielding to the point of exasperation, lures and beacons a man out of routined life into a life of truancy. The distant hills fringed with jungle at its foot, the blue horizon not only creates a lust for freedom from the routine but veritably beacons away a man to an indolent loitering without any purpose. This mentality is innate in the aboriginal and the strong element of the aboriginal in the population has diffused this mentality amongst all the classes. There is, therefore, a certain lack of speed and even an apathy in persuing material progress, but a great deal of poetry which if space had permitted might have been revealed in the monograph. It does not follow that the mentality cannot be worked up to higher purposes. It is only a leader who understands and is acquainted with all the back waters, the mysterious shades in the Manbhum or Dhanbad mentality who could work up a fervour in the people for

progress. That is what the Manbhum mind in the district is, it continues to be the same in spite of severance from the parent district and will continue and no mistake about it should be made.

The cultural aspect of the village life can be ascertained from the festivities that are observed in the locality. Though there are Maghaya and Bengal variety of all higher Hindu castes, the influence of the Holi festival is much less felt and *Durga Puja* is the main Hindu festival even amongst those who call themselves Maghaya. This is the one occasion in the year which is looked upon expectantly more than the Holi which elsewhere in the west had a greater prominence than the *Durga Puja*. But even in the performance of *Durga Puja* certain elements of the childishness is more prominent in this district than in other districts of Bengal where *Durga Puja* is probably the main festival, equal to none in the year. The use of crackers is so copious that a boy or a man from any other part of India or Bengal will be surprised at the great noise created by the crackers during this *Puja* rather than in the *Dewali*. This is peculiar to Dhanbad and Manbhum and not to be found in any other districts of Bengal and Bihar.

Besides *Durga Puja* the other main Hindu festivals to be observed in the villages are the *Bhakta parab* in the end of a year and the beginning of the new. This is mainly a worship of the 'Shiva' and almost all the villagers join in it. In some places hook swinging is resorted mostly by those who do not profess Hinduism but is pledged to swing in order to propitiate the deity or for some material gain. It has been made humane in recent times. The swings do not insert the hook in the skin of their back but tie down a band around the waist or the back and the hook is inserted on that.

In the month of *Bhadra* when sowing has been done or nearing completion, oblation is offered to Indra the presiding God of rains. Villagers collect subscription and set up an umbrella near about the fields. Dancing and merrymaking go on. *Prasad* is distributed. A Brahmin usually officiates as the priest in these festivities. It is distinctly a Hindu festival and has no aboriginal touch in it though the aboriginals partake in it with equal zest as the Hindus.

The *Mansa* is worshipped near about the same time. *Mansa* is a contribution to the Hindu pantheon by the Bauris and Bagdis. Though essentially a festivity of this class yet higher caste Hindus participate and it is usual for even a high caste Brahmin to contribute liberally towards this festival. The goddess *Mansa* is worshipped in some case by Brahmin priest but where such priest is not available the Bauris themselves perform the *Pujas*.

In *Kartik*, *Dewali* and *Kalipuja* are observed by all the Hindus and later in the winter the Santhals observe *Sohrai* which is very much akin to *Dewali* with the exception that a Santhal makes it a point to take *Pitha* (rice cake) on the occasion. They do not worship

the goddess *Kali* on the occasion as the Hindus. There is much drinking amongst them in *Sohrai parab* and the Santhal *Dewali* may not correspond to the Hindu *Dewali* at all times. On the last day of the month of *Pous* a dip in a river is taken and feasting goes on. The festivity is known locally as *Pithaparab* and differs from the *Til-Sankranti* in many respects. *Til-Sankranti* is observed throughout this State but differently. The usual custom is to take *Khichri* or *Chura* and *Dahi* gained from the harvest. In Bengal as in this part, preparation of *Pitha* or cakes and sweets of various kinds is the main feature of this festival. The idea is to be jubilant on the fact that the crops have been harvested and affluence has been gained for a few months. It is noteworthy that even those who call themselves the Maghaya variety of a caste follow this Bengal way of observing the *Sankranti* rather than the Bihari way of observing it. The *Holi* or *Dol* is a short festival and does not extend more than two days whereas in other parts of Bihar it is probably the main festival which extends over four to five days even after which the festivities do not seem to abate. As usual all over India coloured water is used but the use of mud, dirt and filth which is common in certain parts of India is not to be found in this district.

We have then the *Basanti Puja* which is performed in many affluent villages in the district, at some places by wealthy persons in the village and at others by subscription raised by the villagers. Though *Ramnavami* fast is undertaken by many it has not the same implication as it has in Bihar. The *Ramnavami* processions which have become a common feature in every district of Bihar nowadays are not to be found in this district except in towns like Dhanbad and Jharia where the Bihari elements are strong. Instead *Basanti Puja* is gone through on all the four days almost as the *Durga Puja*, though with much less grandeur. Besides this Hindu festival there are others which cannot said to be strictly Hindu. Thus *Bhadu* is worshipped by the Bauris. The tradition says that *Bhadu* was the daughter of the Panchet Raj who died as maid for the good of the tenantry. She came to be idolised and later worshipped especially by the Bagdis and the Bauris. An image of the deceased daughter sometimes of a huge size is made and offerings are put up to her.

In villages there is one *Sima Puja* or offering made to *Rangahari* deity even by the Hindu villagers. A fowl is procured by the subscription from the villagers and is sacrificed to the *Rangahari* in the boundary of the two villages. This is said to save the village from the attacks of malevolent spirits. The worship of *Bhut* or spirit is resorted to not only by the aboriginals but by low caste Hindus and even Goalas. Thus *Baghat* is worshipped by the Bauris and all other low caste Hindus. For the local Goalas it is important to make offerings to it in order to protect their cattle from the depredation of the wild beasts. In all these non-Hindu offerings the *Laya* has the prominence and this *Laya* may be of any caste either Mallik, Bauri or even a Turi.

So far as amusements are concerned cock fight is one of the principal amusements to all villagers who keep cock. Fighting cocks are armed with steel nails or even a blade of knife tied to their feet. This results in death or severe injuries to one of the cocks and the owner of the victor takes away the vanquished cock.

Haribole or *Sankirtan* is commonly performed in all the villages at any period of the year by subscription. The *Jatra* is another amusement mostly performed by the local talentry. The institution of *Nachanias* or female dancers who are concubines of others and perform *nautch* in the village is also common. Often there is a quarrel over the possession of a *nachania* who changes her paramour too frequently and amongst the Rajputs murders are known to have occurred over the possession of a particular *nachania*.

From the above accounts it is clear that a large element of aboriginal custom has crept into a village life. Many of the offerings and *Pujas* have strong aboriginal elements in them. The aboriginal practice of worship of spirit has been infused into Hindu castes and this was largely due to the fact that some of the Hindu castes have enriched their fold by surreptitious absorption of aboriginals by marriage. The worship of *Baghat* amongst the Goalas can be accounted for on some such hypothesis.

The impact of modern civilization on this kind of outlook has produced curious results. The first casualty of modernisation is probably the caste system in some aspect. Though the Brahmin in his village tries to adhere to the caste rule and no-touchism and affects an air of superiority he no longer feels the same distinction, nor does he observe with same strictness the rules laid down by the orthodoxy of his caste. It is not uncommon to hear from a Brahmin coming into work as a cook that it is impossible to maintain that rigidity in the modern set up. A man coming in from village for litigation would not scruple to dine in a hotel by the side of a man whose caste he does not care to enquire. In such cases his touch does not pollute his food. Much of the edge of his scruple is thus blunted and when he goes back to the village after several journeys from the town he has lost faith in the essential utility of no-touchism. He can no longer adhere to it with the same strictness, and as many members of the same family come out they imbibe the same spirit, till the principle of no-touchism in the caste begins to lose its hold on the community. It will thus appear that so far as the rule of commensality is concerned it has given way not only amongst the higher castes but also amongst the lower ones. The Santhals who were intensely proud of their own caste and would not take food from any other, has in the modern set up also been feeling difficulty and does not care so much from which person he takes his food. In regard to connubium caste is still predominant and inter-caste marriages between castes is not a frequent occurrence in this district. Both the lower and the higher castes are anxious to preserve their

distinction in this respect and inter-caste marriages have not come to be looked with any great favour. This is how Dhanbad mind works. While there is progress and light on the one side so far as commensality is concerned, no progress has been made so far as of connubium is concerned. It can be said that the whole of India is still backward in this respect but the degree of backwardness here is greater and no progress seems to have been made in this direction. Even in the cosmopolitan towns like Dhanbad inter-caste marriages will not be looked with the same favour as it might be looked upon in any other town in Bihar or Bengal.

The impact of the modern age on the social system of the aboriginals like the Santhals has been great. It is seen that the Santhal had a complete social system which provided for settlement of all kinds of disputes arising between a Santhal and a non-Santhal. Maintenance of this system was, however, possible if the Santhals were segregated into one place and allowed to follow their own life without intervention of outside agencies. This has not been possible here in this district though attempts have been made in the Santhal Parganas by the Government itself to preserve the Santhal institution. A Santhal is forced to live or to mix with the Hindu neighbour who would not readily submit to the rules of their tribe. If, therefore, a dispute arises between him and a non-Santhal he has of necessity to come to Court to settle that dispute. A tribal *panchayat* of the Santhal cannot effectively determine such dispute nor can the misbehaviour of a Santhal towards Hindu or *vice versa* can be treated effectively by a Santhal *panchayat*. Thus even in a village where the Santhals have a prominence the influence of *Manjhi* or *Jogmanjhi* has considerably dwindled. Together with their secular influence upon which only the spiritual and moral things could be based, there is considerable slackening of the moral hold and the present day Santhal of the locality has not the same reverence for his own institution as the traditional Santhal had. This is good in some way because it clears the path for progress as it has done for the Mahatos but is bad in other. There is, always, danger in another way. For example in this part the tendency is to get hinduised and when there is such hinduisation, the result had been to get a depressed status and sink into the lowest rung of the Hindu ladder. Thus the Bauris, Malliks, Mahulis and others cut off from their moorings, depressed themselves to an extent which is not desirable at all while the Mahatos who have retained the vestiges of aboriginal institutions in their society have a place of pride and are trying to upgrade themselves, by continually giving up such practices as are found to be harmful. The Santhals have not lost the sense of dignity and the one reason for it is that the institution in whatever mutilated form, it may have been maintained amongst them and they are intensely proud of their own institution. To lose all belief in those institutions may result in a depression akin to the Bauris or Malliks. This has to be prevented at any cost.

The influence of the modern political set up is of a dubious character. Intensely proud of his own caste the reception of the privileges given to the Mahato as a backward class has not yet resulted in any tendency towards actual depression or making themselves backward. The Mahato is astute enough to reap the full advantages of the privileges extended to him as backward class, and loudly proclaim that such privileges should be there in the Constitution. They do not, however, forego their claim to Ksatriyaship. This somewhat contradictory attitude has resulted in intense caste sense, and if casteism has been introduced amongst any people here it is amongst Mahatos. They feel a class by themselves and much political exploitation is done by playing upon this sense. The Santhals similarly have been awakened to a 'Jharkhand' spirit creating a somewhat difficult problem in local politics. The other castes excepting probably the Bhumihars do not suffer from the same separatism as in Bihar. Excepting amongst these two or three groups casteism is no problem in this district. The virus that has eaten into the soul of Bihar has been somewhat successfully kept away so far political alignments are concerned. Most castes follow the Bengal pattern, rather than the pattern of the North Bihar.

It has already been discussed that Manbhum and Dhanbad mind has something archaic in it and still looks to the old days of the *Rajas* and *Maharajas*, though their sceptres and crowns have tumbled down by one stroke of pen. The State Government have relieved them of all their magnificent possession. Thus though the zamindars are no longer there the grandeur of the feudal institution with all their paraphernalia seems to have still a hold in the popular mind. The zamindar was an object of veneration. Even at present age he continues to be so, though he no longer holds the same status, power or capacity to influence his subjects. This is so because the relationship between the landlord and tenant has never been very strained nor was there any proper *Kisan* movement in the area. The feudal system to lose their holds on popular mind requires an intense agitation which must precede its abolition. There has been none whatsoever here. There might be an occasional quarrel between the tenant and the landlord throughout the long history of this district but never a serious quarrel which could have the status of a *Kisan* agitation. Such quarrels were against a particular act of a particular zamindar but not against the entire institution. The archaic people need a symbol of power and pomp to do reverence too. It will be for the administrator of the State to take note of this fact and if anything better than the feudal system has not been substituted the result will not be happy. At least the subjects and the Government will remain estranged from each other. The very personal contact (with its attendant emotional content) that the local zamindars used to have with their tenants (absentee landlordism was not a characteristic of this district) has to be substituted by some thing more beneficial to the tenant and the benefits

must be direct to make the tenant to give up his feudal habits of thinking. This appears to be the most difficult task which the present administration is called upon to undertake. No mistakes should be made in this direction.

The strong feudal affiliation has been amply demonstrated during the counting in 1952 General Election. The local zamindars had stood as candidate for the Assembly seats and almost all the village area votes had been polled by them. This phenomenon was largely due to the fact that the feudal influence still continued in the popular mind. The body corporate like the Government which cannot set up a person to capture the popular imagination has no emotional appeal and people do not enthuse over the fact that they have been relieved of their zamindars. It is only through the labour area votes where people throng from outside that most of the Congress candidates were successful. In other areas the local zamindars had influence and polled more votes. This should be an eye opener and the people should be made to feel the direct good results of the abolition of zamindari.

Excepting the industrial areas crime propensities seem to be less pronounced and even when a crime is committed in the villages, it is of a less startling kind. Dacoities are few compared to other districts of Bihar. It is only in the industrial areas that such crimes are committed by people who are mostly outsiders. Murders generally have no plan from before and show the aboriginal tendency and are done on the spur of moment with no premeditation, and when the accused is caught he has neither the ingenuity nor the purse to spin out an intricate defence and quietly gets hanged. This shows that in spite of heavy industrialisation the archaic simplicity is retained to some extent.

Such is the kind of people who inhabit this area. With all their backwardness and their follies their aversion to work for their own welfare and their acceptance of life with an indifference for future may prove exasperating to a social reformer from outside, but they rouse an interest in those who have a real contact with this half childish and mysterious mind full of strange and prejudices and beliefs. A closer contact with them, an intelligent understanding of their problem and their capacities will rouse them from the backwardness. What is required is more sympathy and less aversion and till the writing of this monograph such intelligent understanding of the population does not seem to have been shown.

The people of Dhanbad district may roughly be divided into five groups. They are as follows: (a) The first group consists of the primitive races and tribes that settled down in this area before the Buddhistic period or even earlier. Santhals, Kols, Mahulis are

their descendants. (b) The second group comprises those people who are the offsprings of those that migrated here to settle down when Buddhism and Jainism flourished and spread widely in India or during the days of the later Hindu Kings of Magadh with their capitals at Rajgriha and Pataliputra. (c) The third group consists of the people whose ancestors and forefathers migrated in gradual process covering some centuries to this part of the land mostly to evade religious persecution of the fanatical Muslim rulers and their officials during the Muslim occupation of Bihar and Modern Uttar Pradesh. (d) The fourth group is composed of the people who owe their origin to those that came here in search of jobs and suitable situations under the Britishers when English East India Company or British Government had effected early occupation of Bengal, Bihar, Orissa and other north-western provinces of India. At first they settled down in provincial, district and subdivisinal headquarters and later they managed to acquire holdings in rural areas where they built farm houses and stationed their relations to look after the farming and other acquired properties there. The descendants of these people gradually got distributed in a number of villages lying in the eastern border of Dhanbad. (e) The fifth group comprises the people that came here in swarms from the outlying neighbouring provinces to try their fortune after the finds of rich deposits of coal in this area. Marwaris, Gujratis, Punjabis, Sindhis, Bengalis, etc., have come to Dhanbad to try their fortune as leaseholders, merchants or proprietors of collieries. They migrate from place to place to follow their avocations according to the suitability of place and time. Usually they have permanent house in the urban areas; but they hardly cut off their connections with their native places lying in distant provinces of India. Very often they go back to their native places specially on occasions of marriages of their children or at times when they wind up their business here. Along with them and for the proper working of the collieries there have come a large number of technical men, mining engineers, miners and others. Labour class population of the coalfield also belongs to this group. The people of this group may be described as the floating population of the coalfields.

The refugees from Pakistan both East and West form another group of people. In the wake of the disturbances caused due to Mr. Jinnah's 'Direct action' and partition of the country resulting in the creation of Pakistan, many people lost their hearth and home and migrated to India. Some of them have come here also and have settled down mostly in urban areas. They have now been completely absorbed in the civil population and generally follow professions or business.

Dhanbad district has now become an intellectual centre and a number of high-ranking institutions have been located here either by Bihar State or the Centre. The Mining Institute, the Fuel

Research Institute, the Polytechnic Institute, the Central Colliery Hospital, the Sindri Engineering and other technical schools and colleges, the Fertilizer and Cement Factories, the large number of Railway stations, the Arts and Science Colleges and Schools for boys and girls, the Mining Inspectorate, the Health Inspectorate, the Coal Mines Welfare Fund Office, the Employment Insurance Office, etc., have naturally brought in a large number of highly educated persons at various levels. It is true that their total may not be a big percentage of the urban population but nevertheless they will form an important element in the population structure of the district. This element is, however, more confined to the urban areas, which could be described as the Greater Dhanbad.

Now the special characteristics and peculiarities with regard to the custom, manners, cultures, dialects and languages of each community are described hereunder in brief*:-

Group (a) consists of the tribes and races of the Santhals, Kols, Mahulis, Bhumij, etc.

Santhals or *Manjhis* are found in the hilly woodland areas of Tundi, Katras, Nawagarh, Jharia, Jainagar (Govindpur) and Pandra *Parganas*. Of all the primitive tribes, Santhals are in the highest majority. They are well distributed in Tundi *Pargana* and north-western parts of Katras and Nawagarh *Parganas*. They are also found scattered over several villages in Jharia, Jainagar (Govindpur) and Pandra *parganas*. Special mention may be made of Tundi and North-Western Katras which are predominantly inhabited by the Santhals with a sprinkling of Kols in Tundi alone. The Santhals have retained their ancient customs and culture. They call themselves "*Hord*" and the non-aboriginals "*Diku*". Those who have adopted the manners and customs of the "*Dikus*" are no longer *Hords*. The Santhals speak their own dialect called Santhali. Nowadays books in Santhali printed either in Roman or Devnagri (script) are available. This is mainly due to the Christian missionaries and recent Government efforts. Santhals have no early marriages. Girls normally marry at their own free choice when they attain puberty. They are fond of wild flowers with which often they decorate their persons. Santhals have a host of gods and goddesses whom they worship. They adore 'Marang Buru' or 'Hooding Buru' which term literally means a hill like Parasnath or any other hill present in their area. '*Bandna*' is one of the most important festivals of theirs. The women folk sing and dance in rows their '*Lagda*' dance—a religious dance on such occasions of festivals. The males play

* A certain amount of repetition has become inevitable (P. C. R. C.).

music, sound their drums and blow their *Basuries* (flutes) made of bamboos just in front of the line of the females engaged in dancing. These people are found singing and clapping in praise of the rivers Damodar and Barakar on the occasion of *Makar-Sankranti* (the last day of the month of *Poush*). Nowadays females are found using vermilion on the forehead of their foreheads just like the Hindu women. They put on silver bangles, *Bichha* and *Hansulies* (necklaces) and these three constitute to be their chief ornaments. Previously the women folk used to put on thick *Saris* (*motia*) woven by the local Jolhas or imported from Gaya but nowadays they have taken to blouses, under-wears and mill-made *saris* and various types of jewellery of silver. '*Handia*' prepared from rice ferment is their popular drink on occasions of social or religious rejoicings. They use it on almost every occasion of marriage and festival dance. Sometimes they prepare *mahua* spirit, a kind of liquor which is drunk by both the males and females. They resort to a special kind of dancing called '*Dame*' dance on marriage occasions.

A place of seclusion, overgrown with bushes and shrubs is kept preserved in almost every village for the abode of their village god or *Gram Dewta* who, it is believed, is the protector of the village against all the dangers arising out of evil divine scourges, namely, cholera, pox and the like other epidemics. They worship this god in a body once a year towards the close of winter. On this occasion they make sacrifices of goats, sheep, pigs and hens. *Naya* is the priest. He makes prayers on behalf of the villagers. He burns incense, takes in the smoke and gets intoxicated with '*Handia*' drink and thereafter he dances '*Lagda*' dance round the sacred fire in the *Akhara* whipping on his back with a rope made of the stems of wild creeper plants tied or twisted together. Sometimes he goes on brandishing the rope right and left as he dances around the *Akhara* (dancing floor). Thereafter he sits near the sacred fire and tries to foretell the causes of the past, present and future evils. He also suggests the remedies and retributions of the foreboding evils. The headman of the village is called '*Manjhi*' and the head of the *Manjhis* in the whole *pargana* is called '*Parganait*'. These *Manjhis* and *Parganait*s exercise great influences on social, religious and organisational spheres of the Santhals. They are the natural leaders of the community. Whenever the *Parganait* wants to start or resort

to any social or communal *satyagrah* he sends a *dohra* (twigs of tree) to different villages accompanied with a drum for circulation and the Santhals have to obey this *dohra*.

Most of the Santhals are cultivators. But a few who have no sufficient land-holdings obtain their livelihood either from the forest products or by working in coal-mines. The Santhals are as a race sturdy, strong and cheerful. They have converted most of the hilly '*nalas*' and streams into paddy fields. When they fall ill, they do not go to doctors or physicians. But the *Naya* or *Ojha* is often consulted. He prescribes some sort of drug to which they attach infinite confidence.

The *Kols* are far fewer than the Santhals in number. They are found inhabiting in some parts of jungle areas in Tundi. They are sparsely distributed here and there in some hill-slopes. They also retain their indigenous customs, manners and habits like those of the Santhals.

Mahulis are a class of typical mixture of aboriginals, some of them are converts to Islam. This section is known as '*Malhars*'. But the majority of them are aboriginals. They speak a dialect akin to Santhali. Only a few converts have adopted some Muslim habits in respect of the ornaments of the women folk. The females put on seven metal rings in each of their ears. The chief occupation of the *Mahulis* is making brass-ware and basket-making with bamboo sticks. Cultivation is their chief occupation.

In the recent past Christian missionaries have opened two centres of their proselytising activities, one at Pokhuria in Tundi police-station and other at a village near Chas. They have succeeded in making conversion of quite a large number of native Santhals near about Pokhuria. These missionaries have done a great service by spreading education amongst them and giving them free medical help.

The *Koras* constitute a class of people whose origin may be traced somewhere in the society of the aborigines but they have now adopted some of the customs and habits of the Hindus. They worship the gods and goddesses of the Hindus. They have some demi-gods such as *Panch-Bahinis*, *Kudra*, *Rangahari*, etc. These gods are represented by trees, stones and the like other objects of nature which they paint with vermilion and attribute to them the virtues of deities.

Earth-cutting is their chief occupation. Some of them possess land-holdings and they earn their living either by cultivation or serving as agricultural labourers. The females of their society sing and dance in accompaniment of music of drum beating and *murli* blowing (country bamboo-made flute) on the occasion of marriages. They have the customary to observe a period of grief (mourning) covering only ten days on the death of any of their close relations. On the tenth day after the death of a close relation, people assemble at the *ghat* of a tank or a river and get themselves shaved. Thereafter they take their bath and go back to their respective houses. On the following two days they have a feast.

Kurmis.—Kurmis are well distributed in this area of Dhanbad sub-district. They are predominant in Jharia *Pargana*. Their number is by far greater than any other class of people. The relation and affinity which is found to exist between the Kurmis and Santhals may lead us to assume that the origin of these Kurmis would have been somewhere in the aborigines group. There is a tradition amongst the Santhals that the Kurmis are their elder brother and as such the Santhals take rice or gruel prepared in the house of the Kurmis even though they do not accept this when prepared by caste Hindus. Now the Kurmis claim to be a kind of Kshatriya and some of them declare themselves as descendants of *Kurma Muni*. The Kurmis have adopted to a large extent the manners, customs and habits of the Hindus belonging to higher rank in the society. The females wear garments of their own fashion. The skirts of their garments do not touch their ankles. The married women put on their head a line of vermillion. They wear brass, silver and glass bangles. Some have silver *hasulis* around their necks and also wear eartops. Early marriages were prevalent till a few years back among them. The women sing and dance on the marriage occasions. Blowing of conch shells is totally absent on such occasions in the society. *Karma* festival that comes off on the 11th lunar day in the month of *Bhadra* is observed with great pomp and mirth. Almost every sister desirous of her brother's welfare is required to observe this festival. A week earlier than the actual day of the festival the girls sow seeds of pulses like gram, *mung*, *urid*, etc., in a small basket filled with sand. Soon after the germination of the saplings, the girls dance in a circle around the saplings singing in chorus, every morning and

evening all through the week preceding the day of festival. The name of the Kasai river is repeated often times in the course of their songs. On the day of *Ekdashi*, singing and dancing continues from morning till evening round a *Karma* branch, fixed on the ground for the purpose; and the first half or the whole of the night is passed in *jhumar* dances and songs attended by music. In the morning the girls immerse the saplings in some tank or stream and come back to their respective homes after a bath. Thereafter they feed their brother and tie a *bena* (a kind of grass) bangle in their arms. The brothers in return give them new clothes and garments. '*Jitia*' is another popular festival of the Kurmis. It comes off every year in the early part of *Aswin* month. It is observed on the dark *Astami* of *Aswin*. Every mother observes this festival for the welfare of her children. *Jhumar* dance is held at night round a bundle of sugarcanes placed on the *Tulsi-manch* throughout the night of *Jitastami*. The women folk sing welcome and benedictory songs on the occasion of marriages.

The Kurmis observe days of grief for ten days from the date of death. They are guided by the laws and principles of *Mitakhara* system.

There is a headman called *Mahato* in almost every village predominantly inhabited by the Kurmis. The *Mahato* is like the president of the village society. He is indispensable in every social function. He decides the quarrels arising out of social questions. *Mahatoship* is hereditary. His superior body is the '*Mahato*' of the whole *parganas*. He is called '*Shikdar*'. *Shikdar* exercises supreme powers in every social function specially in cases of marriage and death, etc. The dialect which the Kurmis speak is commonly called '*Kurmoli*'. It has close proximity to Magahi Hindi, but is not quite free from Bengali influence. This dialect differs slightly from the dialect spoken in Hazaribagh district. The Kurmis now have become '*Diku*' as they have fully adopted the customs, manners and habits of the so-called Hindus belonging to higher grade in the society.

The second group of people has two subdivisions. The first section is composed of Brahmin, Kayastha, Bhumihar, Rajput, Ghatwar, Sonar, Lohar, Bania, Goala, Kahar, Kamar, Kumhar, Barai, Barhi, Rajwar, Teli, Tamboli, Sundi, Koeri, etc. The second section comprises of Chamar, Mehtar, Dome, Dhobi, Mirdha, Dusadh,

Jolha, Dhunia, Kunjda and others. Although described before some of them could be mentioned again. The Brahmins are of various sub-castes such as (i) Kanaujia, (ii) Srotriya, (iii) Maithil, (iv) Gourd, (v) Sakaldwipi, (vi) Agradani, (vii) Radhashreni. All these Brahmins except the last one have similar customs, manners, habits and culture. However, they belong to separate *Gotras* (agnates). They are the descendants of the Brahmins who came and settled here from Uttar Pradesh, proper Bihar or north-western part of India. They follow the customs which are prevalent in the tracts they have originally come from. The Radhashreni class of Brahmins came from Bengal during the later part of the Moghul ruler or early part of the British occupation of this area. These Brahmins have the customs and manners which are prevalent in Bengal. The Brahmins are well scattered over the area. Kanaujias and Srotriyas are in majority in *Katras Pargana*. Kayasthas also have several sub-castes such as Ambastha, Shrivastav, Karan, Mathur, Saxena, Bhatnagar, and others and Rarhi Kayastha. The first three came and settled here from Uttar Pradesh or Bihar proper. They retain the customs and manners which are in Uttar Pradesh and other parts of Bihar. The Rarhi Kayasthas came from Bengal along with the Radhashreni Brahmins. These Kayasthas follow the customs and rituals prevalent in Bengal. The Kayasthas are very few in number. They are very sparsely scattered over a few villages in Dhanbad sub-district.

The Bhumihars now claim to be Brahmins. Their occupation is mainly agriculture. They do not follow the priestly work nor are they allowed by the society to do so. They are cultivators and some of them were landlords. But they do not plough the lands themselves. Some of them are lawyers or businessmen. They are in minority just like the Kayasthas. Their ancestors came here and settled down either from Uttar Pradesh or Bihar proper.

Rajputs claim that their forefathers came here from Rajasthan and North-Western India. They retain all the customs and manners of their community residing in U. P. or Rajasthan.

Ghatwars also claim to be Kshatriyas. The ancestors of the Ghatwars were the chiefs and *sirdars* of the people residing in this part of the land in early times when forests were not cleared. They were the defenders of

the *ghats* or mountain passes so they were called 'Ghatwals' or Ghatwars and enjoyed large grants of lands. They exercised powers of almost Governors and rulers in the past.

Sonar, Lohar, Bania, Barai, Barhi, Goala, Kahar, Kamar, Kumhar, Koeri, Kurmi, Teli, Tamboli, Sundi, etc., belong to either Vaishya class or cultivator class. The ancestors of these people came here and settled down along with the Brahmins and Kayasthas who migrated to this part during later part of Hindu rulers or at the time when early occupation of North-Western India by the Muslims was effected. These people are well distributed throughout the whole area of Dhanbad sub-district. Specially Telis are predominantly in majority in Nawagarh *Pargana*. Telis extract oil out of oil-seeds in their *ghanis*, the name given to indigenous oil mills driven by bulls. Sundis are cultivators by occupation. Some of them distil liquor from *mahua* flower. Widow marriage is not prevalent amongst them. Sundis are of two divisions, one class follows the customs and manners of Bihar proper, the other class follows those of Bengal.

The descendants of the people who migrated to this area during the Muslim rule probably under Aurangzeb and later Moghul kings to avoid religious persecution, constitute the third group. Strictly speaking there can be no line of demarcation between the second and third groups. Migration that started during the Buddhistic age, Jaina period or later Hindu kings continued in gradual process till the closing chapter of Muslim rule. Sometimes people were out for the discovery of suitable lands to satisfy their land hunger; but very often during the later part of the Muslim rule they migrated to avoid fanatical persecutions and forcible conversions. It may be mentioned that Dhanbad district is of special importance to the Jains.

Out of total 24 Jain *Tirthankars* as many as twenty found their '*samadhis*' at the nearby Parasnath hill. So it is assumed that this area was once under the direct influence of the Jains. Again the find of the brass and bronze Jain images at Sindurpethy on the southern bank of the Damodar in Chas *Pargana* indicates that Jainism held the ground in this part before the Muslims entered India. The *Saraks* who are strictly vegetarians are believed to be the remnants of the Jains here. The presence of Jain relics, metal images and the existence

of the *Saraks* constitutes to be a testimony to the Jain predominance near about the Damodar and Barakar valleys.

The Jolhas and Dhunias are known as '*Momins*' and are probably the descendants of the early converted low class Hindus and semi-hilly tribes like Chamar, Mehtar, Dome, Mahuli, Muchi, Malhar, etc. They have adopted Islamic mode of life in the main; but they have retained to this day some habits and customs of the Hindus in respect of their dress and ceremonials.

The Jolhas residing in remote villages near about the Hindu habitations freely join the Hindus in observance of '*Chhat*', and similar other festivals. The occupation of the Jolhas is weaving coarse cloth of various types. But some of them own land-holdings. They are principally cultivators. These Jolhas speak '*Khortha*' dialect and educationally they are backward. The Dhunias earn their living by carding cotton and the Kunjras carry on trade on green vegetables, etc.

Another group is composed of the people who are the descendants of those who came and settled here after the British occupation of Bengal, Bihar and Orissa. As Calcutta was the headquarters, the people near about Calcutta naturally came more in their touch. They were the first Indians to be influenced by the English and got English education. For this reason some Bengalis with English education to their credit found lucrative jobs under the British officers in every district and subdivisional headquarters. They also secured services under the local zamindars because of their attainments of English knowledge and they could conduct the zamindari affairs better. Bengali or Radhashreni Brahmins, Rarhi Kayasthas, Baidyas, Sonars, Baniyas, Bauris and the like are the descendants of those people who came and settled here as immigrants from Bengal. They have all become now a part of the indigenous population of the district. Some of them have penetrated and settled down in the villages as well.

The Bengalis have their own customs and manners somewhat distinct from those of other people who are the descendants of the people who came from Uttar Pradesh, Rajasthan or Bihar proper. There are also many points of contact and one influencing the other. The *Durga Puja* and *Saraswati Puja* of Bengal have been

adopted in Bihar. The mode of wearing dress, ornaments or food habits have changed for both. The Bengalis have been the pioneer for female education and the liquidation of *purdah* system.

They have made speculations, sunk capital and have taken the risks. The other division comprises the labour class, working in coal-mines, or mercantile establishments or in the house of the rich as servants and attendants. This group is more of a floating population of this place.

As a result of Mr. Jinnah's direct action, August, 1946 and partition of the country, a large number of people from West and East Pakistan commonly known as refugees came here. These people have been settled mostly in the towns where they follow their avocations being aided by the Government.

The last group of highly educated classes, engineers, doctors, lawyers, teachers, technical men of various levels is progressing in number with the development of the district, founding of more and more educational and scientific institutions. Businessmen and capitalists from all parts of India are now in Dhanbad district.

While Jamshedpur, the steel city in Bihar, has more of one group of technical men, Dhanbad has the privilege of having highly technical men of various branches. The rapid development of the roadways has brought in a great expansion of roadways automobile industry and there is no other place in Bihar which is the contact point of more passenger buses and goods trucks. No other Railway station in Bihar has more of passenger buses and trucks standing day and night nearby for custom. The whole district is now pulsating with development projects, past avenues of industries, trade and commerce, and naturally this group of people is coming in more and more to the district.

THE SCHEDULED TRIBES OF DHANBAD DISTRICT.

They have a large population in the northernmost part of Dhanbad which consists of the Parasnath and Tundi ranges and groups of inconspicuous hills lying north of the Grand Trunk Road comprised in the jurisdiction of Topchanchi, Govindpur, Tundi and Nirsa police-stations. They are scattered in all parts of Dhanbad but they are numerically small in areas lying south of the Grand

Trunk Road, as would appear from the following table (1951 District Census Hand-Book, pages 8 and 77):—

Name of place.	Total population.	Person S.T.	Male S.T.	Female S.T.	Percentage S.T.
1	2	3	5	5	6
Dhanbad District ..	7,31,700	1,14,529	57,137	57,392	15.6
Rural	6,58,098	1,04,629	52,315	52,314	15.8
Urban	73,602	9,900	4,822	5,078	13.4
Jharia Revenue Thana (excluding Dhanbad, Jharia and Sindri Towns).	2,61,109	24,867	12,141	12,726	9.5
Topchanchi	1,00,065	12,432	6,481	5,951	7.7
Gobindpur, Nirsa and Tundi Revenue Thanas.	2,36,864	67,330	33,693	33,637	28.4
All towns of Dhanbad district	73,602	9,900	4,822	5,078	13.4

In Tundi P.-S. which is adjacent to the Santhal Parganas and which covers 80 per cent of the forest and hills of Dhanbad they form nearly half of the total population.

Considering the small area of Dhanbad, the Adivasi population is fairly high. This is due to the considerable influx from outside, more specially from Santhal Parganas and Hazaribagh for working in the coal-mines. They are considered as best miners and the colliery owners are anxious to retain them.

The main types of tribals in Dhanbad district are the Santhals, Mundas, Ho, Kharia, Korwa and Kora. Their population figures are 1,05,069; 7,397; 1,185; 790; 53 and 27 respectively.

The mental tests of the Santhals carried out by the department of Anthropology indicate that they are ahead of the other Scheduled Tribes so far as concrete intelligence and aptitude for practicability are concerned which require skill for hand work, muscular co-ordination, speed, finger dexterity and other motor abilities. But they come off very poorly in comparison with urban Bhils of Central India as regards abstract thinking which requires powers of mental analysis and synthesis. Santhals of the rural area and those under partial influence of industrialisation indicate the same ability for adaptation and are somewhat superior in intelligence.

The Adivasis have their well developed community life, simplicity, honesty, unsophisticatedness, placid contentment and a spirit of abandon, humour and enjoyment. In selecting seed, choosing of the time of sowing and harvesting, the decision of the *Manjhi* prevails.

The priest of the village organises planting and harvesting ceremonies and propitiates gods for the protection of crops and prosperity of the village. For generations several waves of domination have passed over them but they have kept their culture, i.e., their material, social, religious, intellectual and artistic achievements more or less intact due to this well developed community life.

The tribals are a democratic people and their socio-politico unit is the village rather than the tribe or tribal group. Each village is run by a few selected headmen assisted by the village council. The position of headman depends solely on the wealth, personality or force of character. The headman among the Santhals is usually called *Barku Manjhi* who is assisted by a council of *panches*. A group of 15 to 20 villages are under one *Desh Manjhi* and above him is the *Parganait* who controls a *pargana* under him. They have their own tribal *panchayats* which decide matters concerning them.

To a primitive people the method of procuring food is as important as his life. Their religion, folklore, custom, habit and social organisation are all based on the primary instinct of procurement of food and self-preservation. Primarily, the Adivasis are agriculturists growing rice, *makai*, *marua*, *china*, *kurthi*, *rahar*, etc., which sustain them for about six months in a year. They supplement their stock of cereals with edible roots, forest-fruits and objects of hunting and fishing. The devastation of forests, spread of agriculture and indiscriminate shooting of animals have considerably reduced games. Therefore, they have been compelled by reason of instinct of hunting and by the necessity of supplementing their stock of cereals to keep domestic animals such as, pigs, sheep, goats and fowls. They hunt all kinds of animals, fowls, reptiles such as, snakes, rats, crows, birds, wild boars, deer, monkeys, rabbits, crabs, jackals, etc., for their food. They even kill cows and pigs for their food and eat corpses of cows and other animals but this practice is fast dwindling. They do not use oil or fat for cooking food. Sometimes, they use *mahua* oil and very rarely *ghee* for cooking. Among the cereals they take rice and boiled water with salt. Very seldom they use *kurthi* and *rahar dal* as pulses. Generally they eat rice with vegetables boiled in water. Vegetable, meat, fish, etc., are boiled with salt and ground chillies. The cereals are generally cooked by boiling in a pot for a few minutes on fire and then the pots are covered with leaves and kept on fire. Rats, fish, crabs, etc., are also fried on open fire and the meat is taken with salt. Due to weak and small cows they do not have milk, *ghee* or curd to supplement their diet. *Handia*, i.e., rice-beer is their only beverage which they use both for ceremonial and drinking purposes and offering it to their deities. The traditional home-made tribal drinks are said to have some nutritive value and supplement their unbalanced intake of food. They also drink wine brewed out of fermented *mahua* which also has some nutritive value. They have now been taking alcoholic drink.

Marriage by capture was a common and approved means of securing a wife among them. The *Barat* party of the bridegroom and the bride people celebrate a war like dance at the door of the bride indicating the old custom of securing a wife by capture.

In some respect the tribals have a superior culture than the Hindu culture in the sense that they have no child marriage. They have a free marriage and no social or religious condition is attached to their marriage except that the marriage cannot take place in their own caste. For example a tribal belonging to Basuki caste cannot marry a tribal of the same caste. It is the usual custom that the younger brother marries the widow of his elder brother and keeps the peace and economy of the family intact. A Santhal or a tribal may have more than one wife but generally he has only one.

Primitive people seriously believe in witchcraft and often the whole village community unites to drive away or even to kill a poor old woman suspected to be a witch.

Tattooing of different parts of the body is commonly practised on a wide scale in the superstitious belief of keeping away diseases and calamities. The flesh of crows is prized with the idea that it would do good to the eyes. Human sacrifice was practised before. The tribals have a very dangerous and inhuman custom of practising *Bitlaha* on persons committing social crime. When a non-Santhal commits rape or adultery with a Santhal woman the Santhals of the area, armed with their traditional weapons of bows and arrows and axe attack and ravage, often burn house and may mercilessly beat him to death. Then they hold a community feast. If the adultery is done with a Santhal woman by a Santhal, a meeting is held and a fine is imposed on the guilty and a feast is held as if the guilty person was dead. In times of emergency in which the assemblage of the whole tribe is necessary, they give a danger signal by beating *nagara*, their traditional drum, in a peculiar way. They also circulate a branch of tree among the tribal for this purpose. This custom is in vogue since time immemorial. The tribals have a custom of putting their dead in graves but wealthy tribals burn dead bodies.

Loin cloth or a piece of coarse cloth is the usual wear of a Santhal and in the cold weather a coarse thick wrapper is used. The women used to wear hand-spun coarse *sari* of a small width. Now the mill-made cloth and *saris* are extensively used and people are now taking to the mode of wearing *dhoti* and *sari* as the Hindus do. Some Santhal women wear *gendra*, i.e., old and rotten clothes stitched together. Mostly male and female do not wear any cloth above their waist probably because of the heat of the hill. The females cover their breasts with a part of the *saris*. The Christian Santhals are better dressed and usually wear the same type of upper and under-wear as the Hindus. The women and girls are fond of decorating their hair with jungle flowers while going to the market and for a dance. The Santhal woman keeps her dress and body very clean unlike the woman of other castes of the same status. They have

very few clothing in summer as they do not require much clothing but in winter they manage with handloom coarse *chadar*. The bedding of an average Santhal consists of the *sujni*, i.e., old rotten pieces of cloth stitched together into the size of a *dari*. Most of them use paddy straw on the floor or on the cot in winter. They also use mattresses made of palm leaves. In rainy season they use umbrella of bamboos and *sal* leaves for working in fields and for going outside. Very few of them use ordinary umbrellas.

Almost all the houses of the Santhals are situated on two sides of the village lane which is commonly called the *Sadar Kulhi*. They are generally housed on the top of the slope with a view to drain away all rubbish and offensive materials in the rainy season. Almost all the Adivasis have their own houses with a roof over them. The houses are mud-built with straw thatched roofs. There is homogeneity in designs of roofs which are very artistic. The walls have paintings. Each house contains a *bari* land which is meant for growing vegetable. In most cases, the houses contain only one room in which the whole family sleeps at night, cooks the food, keeps their *denki* or paddy-husking lever and *mories* for storing paddy. There is another enclosure in the courtyard in which poultries, pigs, goats, sheep, etc., are kept. The Adivasis plaster the walls and floors of the house with cow dung and colour and keep their houses neat and clean unlike the houses of other castes belonging to the same status. There are hardly any windows and openings in the house. The richer of the Santhals are now building tiled houses with courtyards.

They have *khaks* (bedsteads) of the size of $4' \times 2\frac{1}{2}' \times 1\frac{1}{2}'$ which are cross-woven with strings of jungle fibres. The reason for the smallness in size is a continuation of the superstitious belief among them that the man would die if his legs are not outstretched beyond the cot. This cot is also used for sitting outside and for drying grain. The Adivasis have a *machli* of $2' \times 1\frac{1}{2}' \times 1'$ cross-woven with strings of jungle fibres which is used as a stool. They have *pirha* to sit on the ground floor which is made from the local wood. Wealthy Santhals use tables, chairs, or benches. Generally the Santhals put their few clothes and beddings on *algani* which is a piece of bamboo hung from the ceiling with strings. Cooking earthen pots, earthen pots containing *ghee*, oil, etc., and cooked food are either kept on the *takhas*, that is, a space on the wall or on *shika* which is made of ropes of jungle fibres and suspended from the ceiling. Earthen pots are usually in demand for the kitchen. The valuables are kept in earthen pots and buried in the floor at a place which is known to the head of the family only. They use *thali*, *katora*, glass of metals and *karahi*, *chholni*, etc., of iron.

Games and Pastimes.

The Santhals organise an annual hunt once in the month of *Baisakh* (April) before sowing of crops in the Parasnath, Tundi and Dimunda hills. Dimunda *pahar* of Tundi P.S. is called the king of

God and the Parasnath hill is called *Morongburu*. A successful hunt is always considered as an omen of successful harvest. After the hunt the tribals gather five seers of rice, five seers of *chura* (fried rice) and twenty pieces of bread which are subscribed and shared among them whereas the common hunt which is generally a deer is shared by them. On *Sankranti* day the *yatra* (start) is done by yoking and ploughing the bullocks and worship of *Morongburu* and bows and arrows. The *Barku Manjhi* asks the village folk to live a good and austere life. Archery competition is held on that day and sweets are distributed to successful contestants. The function ends with dancing and singing. While going to the forest the Adivasi gets himself armed with bows and arrows and *tangis* (axes) and silently track animals whenever they are found even when he is engaged in cutting wood and carrying timber. The children learn to move swiftly through the dense jungles, to track animals silently and to aim their arrows on birds and small animals. One of their pastimes is cock-fighting on market days in which the beaten cock is lost to the winner.

Adibasi Culture.

Tribal art, dances and music have their exclusiveness and high development. They are poor but they keep themselves wonderfully happy and cheerful by their community music, dancing and singing. Their musical instruments such as *nagara*, *dholki*, *jhanjh* and *mridang* are simple but give a vigorous music in tune with their tenor of life. Dancing is also a magico-religious means for pleasing deities. Music and dancing and singing start with nightfall almost in every village and continue till late hours. The boys and girls are the usual performers while the mature and the old are observers. The *akhara* or the dancing floor is a part of their existence.

Tribal art finds expression in the artistic painting on their houses, construction of roof, rhythm and substance of their songs and the movement of the bodies. Clean in mind and body they have a culture which could well be emulated to a great extent by others.

Rituals.

The festivals of the tribals are entirely connected with their agricultural and natural operations. In all festivals a small quantity of rice beer locally called '*handia*' is used by the *Naya Manjhi* and every festival is enjoyed with dancing and singing and music.

The '*Bandana Parab*' is their great festival which is observed in the month of *Poos* corresponding to January each year. The *Naya Manjhi*, who is their priest, performs the *puja* in the *Burha Burhi Than* (sacred place) and then the *Barku Manjhi* performs the *puja* and thereafter all the villagers perform it. Ghosts are

worshipped, hens and cocks, boar, pigs and goats are sacrificed and the function ends with community dancing. Generally they get heavily drunk. They worship *zahirasthan* which is a sacred grove where the gods live. No one can cut the trees of this grove. They also perform *Kali Puja*, *Durga Puja* and *Rash Purnima* and *Mansa Puja*. Some of them have clearly been taken in due to the impact of Hinduism.

The *Sarhul* festival marks the bursting of the trees into new leaf and the beginning of the spring while the *Karma* festival marks the completion of the transplantation of the paddy. The *Jitia* festival is held for the benefit of the children only. Their festivals are well timed and properly spaced.

Agriculture.

The Santhals are generally settled agriculturists. Shifting cultivation is nowhere practised here. The productivity of their lands is generally very low. Besides the main rice crop they grow *makai*, *marua*, *kurthi* and other crops for home consumption. They do not give any attention to the production of remunerative cash crop, such as sugarcane, tobacco, potato, chillies, oilseeds, vegetable or fruits. Their agriculture is carried out according to primitive methods. Next to Agriculture the main occupation of the Adivasis is coal-mining, earth-cutting and hard manual labour. The coal-mines and industries in the district give them a great opportunity for employment.

Forests.

The Adivasis used to freely exploit and even damage the forests. Since the introduction of Bihar Private Forests Act, 1946, the forest area has come under the Government management. The reservation caused a problem for them and for sometime they were sullen. The coal-mines and development of industries in Dhanbad district have lessened their problem and they have now adjusted themselves.

Medicine.

The treatment of patients usually consisted in many cases of incantations, charms or performance of *puja* and use of simple herbs, the urine and *ghee* of cows, the knowledge of which is handed down from father to son. Complete starvation and abstinence from drink is ordinarily prescribed in fever cases. The Adivasis are generally apathetic due to seclusion and poverty, to the hospitals and dispensaries. Witchcraft is still a potent factor and the witch doctors are in great demand.

The Adivasis suffer mostly from malaria, dysentery and kala-azar and small-pox which are due to impure water and forests. A special anti-malaria unit has been recently opened in Jhinaki specially for the benefit of Adivasis. Dispensaries and hospitals are being opened

up in their tracts. The Blocks have a hospital each and now slowly their allergy for hospitals is expected to liquidate. Wells are being sunk for supply of good water.

Cottage Industries.

The cottage industries of the Santhals comprised carpentry, spinning and weaving, basket and mat-making, *khapra*-making (tiles), rope-making, *dona*-making (leaf cups), lac-rearing, sawing and *biri*-making. Taking into account the economic backwardness of the Adivasis the Government issued notification no. D/3/275/53-1040/C.I., dated the 5th February, 1954, directing that sections 9 and 10 of the Bihar and Orissa State Aid to Industries Act, 1923, requiring security and mortgage shall not apply to the grant of a loan or the supply of machinery on the hire-purchase system involving the advance and expenditure of an amount not exceeding five hundred rupees to them for the growth and development of cottage industries. The development of various industries in Dhanbad has given an immense opportunity to them and cottage industries do not now provide them with hardly gainful occupations. In spite of that loans have been granted to them for starting cottage industries.

The Thana Welfare Officers act as their friend, philosopher and guide. That is the aim.

In addition to the services of Thana Welfare Officers the non-official organisations of *Adinjati Seva Mandal*, Ranchi and Manbhum *Adimjati Seva Mandal*, Gosaindih and Vivekanand *Ashram*, Tundi place their services for the welfare of the Adivasis.

SOCIAL AND HOME LIFE.

As regards religious beliefs, manners and customs, the people follow the pattern prevailing in the contiguous districts in West Bengal and Hazaribagh in Bihar. There is not much difference in dialect within the same linguistic group but the rural population is distinctly divided in mother-tongue on the basis of Hindus, Muslims, etc., on the one hand and Adibasis and Scheduled Castes on the other. Among the villagers, there is today a drift visible towards towns and the mining and industrial areas. Inevitably this is influencing the manners and customs of the people and due to universal free education provided by the State Government in public schools, the tendency is towards a common script.

The social life of the villagers remains mostly as simple as before. Old traditions and beliefs prevail due to conservative nature of the population particularly in the rural areas. The old idea of joint family system among the Hindus is rapidly liquidating even in the villages. The shift of the more intelligent and educated section from the rural areas to the towns is adding to the liquidation of the joint family system in the rural areas. Family life is becoming more and more individualistic. Usually the branch of the family

which earns more money slowly separates itself from the poorer branch. Family life in the villages is disintegrating and educated persons as a class are shifting to the towns. Among the lower castes, morals seem to be rather weak and the grown up married girls though in rare cases do not hesitate to get away from the protection of their husbands and live with other people of their own free choice. For this purpose, no legal divorce is resorted to and it is not unoften that after sometime the married girls return to their husband's family where they are received back as a matter of course. Dowries are paid generally by the girls' parents but in some lower castes and groups, dowries are also paid by the husband's families. Inter-caste marriages are rare. The marital age varies regarding the custom and sometimes young girls within the group of 5 to 10 years are given away in marriages. Prostitution, traffic in women, adultery, etc., are not practised as a profession due to the liberty already enjoyed by some lower caste people. Drinking is an almost universal vice and the gambling habit is very common. This is particularly so among the mining and industrial workers who earn a lot but squander away more than 50 per cent of their decent income over drinking and gambling. Efforts are being made by various agencies to reform their habits and to win them over from their vices of drinking and gambling but without any appreciable success so far. All these observations apply to mostly lower caste families in rural areas but the higher caste families in the villages are free from those vices, the loose marital practices and moral delinquencies. Conservative and orthodox by nature, these higher caste people in rural areas are rigidly sticking to their old traditions, habits and practices and so far as these people are concerned, there is little difference in urban and rural areas. The Adibasis and aboriginals have neither been appreciably affected by the changes of this industrial age and have practically remained constant in their habits, practices and ways of life although a vast majority of them have come out to earn their living in the mining and industrial establishments.

For the working class people, employment in industries on a vast scale as in this mining district of Dhanbad has not been an unmixed evil due to those vices in their lives but it has also helped to bring about a great economic change on account of their increase in earning. A miner's family consisting of himself, his wife and adult sons who are all wage-earners usually raises its earning to somewhere near about Rs. 500 a month as the salary for an unskilled mine worker has been raised to the level of about Rs 100 a month by the colliery award. This spectacular rise in a working class family's monthly income is reflected in the habits of the family members, the females and children particularly, who are not only dressed well now-a-days but have a few ornaments, wrist watches and a few other articles like those of middle class families. There has been a visible improvement in their general health due to their ability to have adequate healthy meals as required and also more nourishing

and palatable food articles. This applies not only to the mine and industrial workers but also to all people in the lower strata who make a decent income by their caste occupations and other kinds of work.

As regards property rights and inheritance laws it may be noted that for the Hindus, the law of inheritance is governed by the Hindu Law and in the case of the Muhammadans, by the Muhammadan Law. The Hindus are governed according to laws laid down by *Dayabhag* or *Mitakshara* system and also by local custom. The Bengalees are followers of the *Dayabhag* system whereas the Biharees are generally the followers of the *Mitakshara* system. The aboriginals are protected by restrictions on transfer of their lands although the rigidity of the law is being relaxed gradually. Other people in the rural areas enjoy all usual property rights and unrestricted power on transfer. This area being a mixed area, the people are ruled by the laws of inheritance of either system according to the degree of influence on them. The followers of *Dayabhag* are, therefore, governed in respect of inheritance by the *Pinda* theory whereas the followers of the *Mitakshara* system are ruled by consanguinity.

The position of women in this district along with the women elsewhere has been improved since the passing of the Hindu Marriage Act, 1957. A Hindu daughter has now as good a claim in her father's property as the son, provided her father does not debar her by law. Widow marriage and divorce are coming in though not common. Monogamy is the rule now.

So far as Muhammadans are concerned the father has the absolute right in the property and can debar any of the sons from inheritance. Among Muhammadans the daughter has as good a claim in her father's property as the son and there is a fixed rate of the rights of son and daughter and the other relatives.

Apart from the loose morals and comparatively free marriage systems stated above, monogamy is the general rule, polygamy is popular and polyandry is not altogether unknown in the lower castes among the rural population. Civil marriages among these people are not resorted to because they are not necessary.

As regards home life it may be noted that changes are seen in the pattern of houses and household particulars in the urban areas. The traditional house with a few rooms, narrow verandah, and a courtyard with a well, kitchen, lavatory and cowshed is now better planned, although the floor space has become less. The use of cement is common and the low mud and brick house with lime is being replaced by cemented concrete smaller houses. Owing to the great demand for residential house, flat system has been superimposed on houses which were not built for that purpose and not much privacy is allowed. The part of the house in towns which is neglected is the

bath-room. Even in big residential houses very small bath-rooms are to be seen. Housing conditions are rather exacting in every town and for the average family the house rent paid represents a big percentage of income. Although living in flats is gradually coming in vogue with difficulties about sharing of entrance, kitchen, bath-room, lavatory, well or tap, there is no sign of community cooking coming in. Even in a small house, when there are several occupants, everyone has a separate cooking arrangement. Yet this system of sharing houses goes to break down many social conventions and caste barriers.

There has not been much change in the pattern of houses in the villages. Richer people who are building cemented concrete houses in the villages are adopting the modes in vogue in towns adding certain rural features. There is more of living space per inmate in houses in the rural area. The poor live in very small huts in insanitary conditions.

The aboriginals, particularly the Santhals live in humble dwellings which are, however, kept exceptionally neat and clean. They also attach certain sanctity to the marital relationships and keep their young girls under strict watch so that they may not go astray and commit any vices with youths of non-aboriginal tribes.

Another sign of the upgrading of the standard of living is the provision of more furniture in the household both in rural and urban areas. The average family has some furniture in the houses consisting of bedstead, tables and chairs. However, in the villages, tables and chairs are rarity. But in the towns there will be found one or two benches, tables, a couple of stools or chairs even in the household of a man of lower income-group. The families of higher income-group have the proper furniture for the drawing, dining and other rooms.

Daily life.

The daily life that is prevalent at the present time, either in towns or in villages, in the district is somewhat different from the daily life in vogue fifty years back. Some of the factors that have brought about the changes are the spread of western education with all its corollaries, growth of libraries and places of amusement, the influence of the press, trends in the economic condition of the people and improvement in communications. There has been a remarkable change in the social values of castes; particularly the vernacular press has brought about changes in the mental outlook affecting the daily life.

The much neglected villages have now attracted the attention of the Government and the desertion by the zamindars and the richer people for the towns has been to some extent compensated. The system of *Gram Panchayat* has a great role to play in raising the status of the villages. In many a big village, a Block Development Officer, a *Karmchari*, a *Mukhiya*, a *Gram Sewak*, a Co-operative

Inspector, a Veterinary Assistant, a Medical Officer, a Health Assistant, an Overseer, etc., may be found. This picture is quite different from what we had a decade before, when in the rural area the only static official normally was the police thana officer. With the emphasis on development work the villages have assumed a new role and will go on playing a bigger role in the future.

Another factor affecting the village life is the fairs and *melas*. The *melas* and fairs bring to the village communities the commodities which have now become a part and parcel of the village household. Articles like lantern, torch, bicycle, better types of shoes, various toilet articles, etc., have a very good sale. In spite of better communication facilities that have cut out the distance between the urban markets and the villages, the *melas* and fairs have still their fascination for the rural public.

The daily life of the people varies according to different status and avocations of the castes or classes.

Rich people, whether in the urban or in the rural areas, will have a routine different than that of a poor man, a day labourer or an office assistant or a petty shopkeeper. In the urban areas the common pattern of daily life of the intelligentsia class of people is that the person rises early in the morning and gets ready after his bath and breakfast within an hour. He reads the newspaper and then turns to the call of his profession. By 10 A.M., he is ready after a meal for his place of business. In the evening he will probably study, visit friends or a club or some amusement centre or spend the evening with a pleader, a school or college teacher, a businessman and a Government servant. A lawyer or a doctor will have to deny himself the pleasures of social amenities sometime after dusk because of the demand of his profession. Usually a businessman stays at the place of his business till quite late in the night. Amusements, like cinemas or theatricals, will not be normally resorted to as a part of daily life. The Sundays or other holidays are usually spent in resting or visiting friends or some amusement centres.

The office assistants or the persons associated with the officers, courts, etc., in the towns have a regular pattern of life. By 9-30 A.M. or so he is to get ready for office and after a quick meal he will be in the office by 10-30 A.M. In the noon he takes a cup of tea with probably some snacks.

A daily labourer in the town starts his work early in the morning and returns by 6 P.M. or so. His meal is either taken to the site by his people or he has to take some dry food, like *sattu* or *bhunja* with him. The labourer in the town has seldom an opportunity to have a noon-day meal at his house on a working day. Usually by the evening he comes back very tired and has to relax himself.

The labourer in a village takes some food cooked over night, locally known as *basia*, early in the morning and goes for his work. He works in the field whole day and usually has no proper midday meal. If at all a noon-day meal is taken to him by the women folk of his family, this meal usually consists of cooked rice and probably some spinach (*sag*). He comes back home in the evening and after a wash he has his substantial meal in the night and retires. This meal will also consist of cooked rice, probably a little *dal* and some vegetables. The evening meal is usually taken quite early and by 8 P.M. or so a labourer's household will cease for the day. The women folk of his family would add a little to the family income by working in the house of some rich neighbour. They would keep themselves busy in cooking food, washing clothes, looking after the children and doing a little marketing.

The average town wage earner would go to his place of work after taking some snacks, the quality of which depends on the financial means of a family. If he is a mechanic, or a mason or a carpenter or belongs to a slightly higher wage-group, he would probably have some *chapatis* of wheat, some vegetables and a cup of tea. Meat or fish or even *dal*, however, does not find place in the daily menu of an ordinary wage earner, whether in the town or in the village, whose income ranges between Rs. 2 to Rs. 2.50 per day.

One thing is remarkable to be noted that in this district the industrial labourers working in the coalfield areas come in the evening and after getting afresh they usually indulge themselves in intoxication. About 95 per cent of them drink wine because without this they cannot work in the coal mining areas as a result of which they have to take loans on interest from *Kabuliwalas* or other money-lenders.

Entertainments.

Economic pressure has left little room for entertainments. Population has increased enormously but there has not been much expansion in the field of production. Wants of common men have also increased without any commensurate rise in income. A lot of leisure is spent in idle talks and local politics. However, songs and music have a great fascination for the rural people. *Bhajans* and *kirtans* and devotional songs with music have not lost their popularity. Apart from them there is a craze for particular types of songs in particular seasons like Holi, etc. The *melas* and fairs have a great impact on the rural population. Usually the *melas* and fairs provide a number of amusement centres such as *nautanki*, theatre parties, circus, cinema shows, etc. These amusement centres in the rural areas have a great influence in the sense of humour and the craving for amusement among the rural population. Many of the cinema hits could be heard sung by the villagers.

Football matches and wrestling have a great hold on a rural public. In bigger villages as well as in towns there are theatrical parties during particular festivals like *Durga Puja* or *Deepavali*.

The towns in the district have somewhat better facilities for amusement and recreation. Dhanbad district has got ten cinema houses and some sort of exhibition or amusement centres practically remain there for at least four to five months in the year. Besides, there are many recreational clubs for social and cultural advancement in the district, viz., Union Club, Rotary Club, Lindsey Club, Railway Club, *Tarun Sangh*, all at Dhanbad; Union Club, Jharia; Lodna Club, Lodna; Bhaga Mining Club, Bhaga; Bhartiya Club, Katrasgarh; Band Mazdoor Club, Govindpur; Sijua Mining Club, Sijua; Maithon Club, Maithon and Panchet Recreation Club, Panchet.

The student population has very little contact with their teachers during the hours beyond the college study. The bulk of the student population fend for themselves in the afternoons and congregate near the tea shops or the restaurants or visit cinema houses. Football matches and other games have a stronghold on them and their craze and interest could have been canalised to organise more of sports, cultural meetings, etc. The towns do not have adequate playing grounds, parks or centres of cheap amusements and recreation. Cinemas are the big attraction in the towns now for amusements and recreation. Club life has also developed to a great extent. Card games are very popular.

It is a regrettable fact that there has been very little recreational use of the forests, lakes, springs and beauty spots in this district. Very little use is also made of the few libraries in the district. It can be said that there is not much utilisation of leisure by proper relaxation in the district.

Prostitution and traffic in women.

It is unfortunate that prostitutes should be accepted as a common element in the social structure of Dhanbad town till very recently. A large number of prostitutes lived and many of them own *pucca* houses in Lalbazar in Jharia, Godhar in Kerkend P.-S., Joraphatak and Matkuria in Dhanbad police-station. In the vicinity of these areas there are houses of other respectable people, shops, etc.

This feature has a background. In the olden days it was nothing uncommon for a rich zamindar openly maintaining public women and also going out with them in vehicles in the evenings. Songsters were in great demand and were a common feature in social ceremonies like *Tilaks*, marriages, etc. There were also singers and dancers among them and it has to be remembered that it is this class of women who were both patronised and despised in the same breath. This class had kept up the institution of classical dancing and music when they were not cultivated at all in domestic families.

Three decades back it was unthinkable that an educated school or college girl would openly dance and sing in the public. There has been a great advance in social thoughts regarding music, dance, etc., and in the light of the present trend the contribution of the professional singers in the past should not be totally ignored. If there was a large section of them that had fallen in morality the responsibility was not exclusively theirs. The very fact that they were allowed to live in the heart of the town, built or owned houses, and carry on the profession openly shows that there was an encouragement to them by the society.

With the spread of education and advanced thoughts there has also been a simultaneous upgrading among the women of this class also. It is a common feature now that many of the fallen women are bringing up their daughters or younger sisters in a different atmosphere and are keen to give them a proper schooling for their future.

In this district prostitutes were not confined to Dhanbad and Jharia towns only but some of other townships and large villages also had a number of prostitutes.

An investigation was made in May, 1962 and it was ascertained that there were about 50 families of prostitutes in Lalbazar *mahalla* in Jharia town. As usual their places have to be carefully watched by the police as various types of anti-social elements collect there.

In 1956 Suppression of Immoral Traffic in Girls and Women Act was passed by Central Government. It was enforced in the district of Dhanbad in November, 1960. Since the enactment of this Act these areas have been declared as Red Light Area. Almost all families of prostitutes have left this place. The interested people used to visit places like Sitarampur, Lachipur and other areas in the vicinity of Asansol in Burdwan district.

The abolition of zamindari and the deterioration of the economic condition of the common mass have affected these professionals very adversely. The changes in social ideas do not encourage the singing and the dancing of such women at the social functions. Without a leisured class of men with long purse the financial condition of such women is bound to deteriorate. This is what has happened and many of the girls of such families are now getting themselves educated.

There is still a certain amount of underground traffic in women. The enquiry also disclosed that a few of them had to adopt this profession because of the hardships or because they were led astray at a very young age and society would not take them back.

Since the Immoral Traffic Act was enforced in the district in 1960, the financial condition of the prostitutes has declined. Social consciousness has to be aroused and a proper rehabilitation in the practical field is essential.

Drinking and Gambling.

Dhanbad district is not a prohibited area. The revenue of the Excise Department is increasing year by year. Both country and foreign liquors are sold in huge quantity.

Drinking for the common man has been a feature because the district is an industrial one and full of collieries. The labourers working in the industries are accustomed to drink daily. There are licensed shops both in the towns as well as in the rural areas where country liquor of different grades is sold. There is a ban for the consumption of country liquor within the premises of the shop. This is not strictly followed as investigation shows. The idea is that if there is a ban on consumption of country liquor within the shop premises there will be a decline in the consumption of the liquor. It was thought that the people will hesitate to buy country liquor and take them home for drinking the beverage. But this is counteracted by allowing the people to drink just outside the shop. Sale of foreign liquor is also controlled. The enormous rise in the price of foreign liquor stands as a check to its promiscuous consumption. The sale of the foreign liquors has increased now than in the past.

Certain types of criminal offences are usually associated with promiscuous drinking. Crime figures of sexual offences commonly associated with heavy drinking will be found in the relevant chapters but it is difficult to say what percentage of such crimes could be said to be due to drinking. Another common offence associated with drinking is gambling.

Gambling is not, however, a dangerous problem in the district. It is, however, understood that gambling is not only confined to the lower strata of the society or the criminal class. It is said that some officials and non-officials also indulge in some form of gambling, etc., within closed doors. It may be mentioned here that during *Diwali* gambling is very common. There are various modes of play with dices and gambling with cards. Card games are popular in modern society. Such games are bridge, rummy, flush and *tin lasia*. Of course, the games of rummy, flush and *tin lasia*, *mangputta* are common in rural society too.

ECONOMIC AND PROFESSIONAL GROUPS AND CLASSES IN RELATION TO SOCIAL LIFE.

In spite of the rapid industrialisation of the district, agriculture still remains the most important occupation for the majority of the population and even a sizeable percentage of the non-agriculturists has something or other to do with agriculture. The agricultural economy permeates the social life in the district. The bulk of the population, however, still remains rural. According to the provisional census figure of 1961, the urban and rural population of the district are 2,90,341 and 8,68,022 respectively, i.e., the percentage of

rural population is 74.9 per cent and that of urban population is 25.1 per cent. The rural pattern of life rules the district and the present Welfare State has put the necessary accent on it by emphasising the importance of the agriculturists of our villages.*

The pattern of social life is in a crucial state owing to the impact of the present day socio-economic changes. Dhanbad district is full of hills and forests, wild animals and minerals. The greater resources of the district are being tapped and the district has now a fair share of roads and railways. People from other tracts with different culture-complex have started to settle in Dhanbad and most of them have settled in the industrial areas like Jharia, Sindri and Dhanbad. A large labour force had to be recruited on very high wages to complete the projects. The large recruitment in the coalfields had also contributed to the upgrading of the common man. In the near future the Bokaro Steel Plant in Dhanbad will help the men of this district to earn more money.

The impact has been marked on home life. The types of dwellings are changing. The mud-huts in the urban areas are slowly giving way and people who worked and lived outside would not be satisfied unless there is probably a chair or stool and a table. The old loin cloth of the Adivasis is hardly to be seen. Those days are gone when the Adibasi girl would be happy to move about with a small piece of rolled coloured mat in her ear-lobes. Similar changes are also observed in dress and ornaments of middle class family and the families in the higher income-groups. Their dress, on the whole, is now simpler, more with an eye to durability and cheapness. The present day dwellings that are going up in Dhanbad are not being controlled and hence different types of houses are to be seen. The furniture pattern in the dwellings of the family of middle class and higher income groups is also changing. The present day youths are allergic to squat on the ground and have their meals. There is more of furniture in the living rooms. The change in the pattern is definitely underlying a more comfortable mode of living. Along with the other changes in home life, the pattern of food is also showing a change. More people are turning non-vegetarian and drinking of tea is replacing consumption of milk. Restaurants and hotels are springing up in the towns and villages. There are more people now that have taken to smoking and drinking. There is a perceptible shift of the upper and middle class people to the urban areas.

There are also changes in the amusement sources. The *melas* and *hats* used to have some rustic sources of amusements. The communal dances of the Adivasis were more seen in the past. The *melas* and *hats* are now visited by small movies, *nautanki* dances and demonstrative cinema concerns. *Jatras* and *kirtans* are, however, still there to keep up the older tradition of instructive amusements.

*Final 1961 Census figures were published later, see Appendix (P. C. B. C.).

In urban areas cinema shows are becoming more popular. The loudspeakers broadcasting cinema hits as an advertisement have now become a nuisance.

As regards impact of zamindari abolition in the district it may be mentioned that the rural population forming the backbone did not supply the leadership in the past decades and has now been removed. The zamindars with their power of purse and their contact with the administration and the middle classes supplied the leadership. Next came the lawyers and other professionals who formed the brain trust in the district. The zamindars as a class cannot be run down because many of them in Dhanbad district tried to discharge a part of their social obligations by starting schools, colleges, libraries and other cultural institutions.

The traditional leadership in society, rural or urban, come from either the men of the higher caste or the zamindars. The present day system of education and the socio-economic changes previously indicated had already started sapping the leadership of the castemen when came the abolition of zamindari in 1957. The numerous zamindar families had been nursed with the tradition of keeping a number of *kamias* and maid-servants. In presence of the zamindar, his tenants would not dare sit on the same platform where the zamindar used to sit. The average zamindar riding on a horse would have a couple of *kamias* run after him to hold the horse if he got tired and wanted to get down. The inaccessibility of a number of *thanas* helped to keep up this fear of zamindars. The economic status of the zamindar was hardly a factor.

But this leisured class was pulled down from the high pedestal. He has now the problem to earn his livelihood. Excepting a few, the economic condition of others is not enviable. The *kamiauti* system had been abolished sometime back and now it is a problem for them to have a domestic servant and agricultural labourers. Many of them have turned to business. Some zamindars are now taking lease from the Government to work the very mineral resources of their previous estates which they had neglected. Some are turning forest contractors, timber merchants or licensees of public vehicles. Exploitation of the industrial resources in big or small scales will open new employment chances.

The abolition of zamindari has affected various strata of people. The landless labourers, agriculturists, service holders, lawyers and merchants have been affected directly or indirectly. The zamindars who were more or less a leisured class used to employ a vast number of *gumasta*, *patwari*, *gorait*, *barahil*, etc. A very negligible percentage of them has been absorbed by the Government as most of them were not found quite fit for Government employment. Some of the lawyers lost a very good source of income.

The impact of the abolition of zamindari is being felt in the changes of social values. Dignity of labour is more appreciated. The professional classes were previously taken to be socially high because of their avocation. The adult franchise, the statutory removal of untouchability and change of the character of the Police State into Welfare State since Independence had been won, have highlighted the importance of the common man. The political and social changes are leading to a certain confusion. In this great change the educated professional groups like the lawyers, doctors, educationists, businessmen, etc., have a great role to play. It is the educated middle class that gave the leadership in the 19th and early 20th century almost everywhere. It is felt that with the liquidation of zamindari and high casteism the educated professional groups should again come into their own after a little while. Hence with the spread of communication and quicker locomotion that sense of prestige associated exclusively with the English educated men of the towns and the professionals had already started liquidating when the abolition of zamindari came in. At the moment there is no natural leadership for an English educated man with a long purse only because of his education or money.

It may be noted that the agricultural economy of the district has its own problems. The biggest problem is the ever-increasing population. The agricultural economy of the district is coming to a saturation point and even agriculture has to be industrialised to keep pace with the changes. The growth of population must bring in a certain amount of wastage of human power. The Third Five-Year Plan will bring in a great change in the district but if the population goes on multiplying at the present rate, much of the good work will be undone. The food situation is bound to become much more acute in a decade unless there is a check on population.

Another great need of the district is the amelioration of the condition of the women folk in the villages. Even the blocks mostly aim to bring about changes more for the direct good of the males than the females. Many of the Development Blocks have not even got a sprinkling of women on the staff who could more usefully take up the work of social education. The district lives in the villages and the leadership in the villages could only come from the women who have got tradition and culture behind them and all that is required is the touch of literacy and education. It is unfortunate to mention that there has been extremely poor progress in the district so far as this aspect is concerned and the impact of an unenlightened women population cannot have a good effect on the social life.

CHAPTER IV.

AGRICULTURE AND IRRIGATION.

The present district of Dhanbad which was a sub-district since 1921, has been given the status of an independent district from 1st November, 1956. The two police *thanas* of Chas and Chandankeari which formerly belonged to the Sadar subdivision of the old district of Manbhum have been added to the district of Dhanbad. According to the census of 1961 the district including Chas and Chandankeari has an area of 1,114 square miles with a population of 1,158,610 souls as against the population of 905,783 in 1951 census (adjusted figure after re-organisation of Bihar). Dhanbad is the smallest in Bihar so far as area and population are concerned.

The district of Dhanbad is the only district unit where the non-agricultural population outnumber the agricultural population. Roughly 51 per cent of the total population derive their livelihood according to 1951 census from the non-agricultural occupations, but one part of the district varies widely from another part.* In the central zone consisting of Jharia, Kenduadih, Dhanbad, Jorapokhar, Jogta, Sindri, Katras and Chirkunda police-stations, non-agricultural occupations account for about 82 per cent of the population whereas in the remaining police-stations of Govindpur, Baliapur, Topchanchi, Baghmara, Tundi, Nirsia, Chas and Chandankeari, 84 per cent depend on agricultural pursuits. The Tundi revenue *thana* is a purely agricultural tract where 98.2 per cent of the people are agriculturists. On the other hand 99.4 per cent of the population of Jharia police-station are employed on non-agricultural occupations. The population of the district associated with agriculture is 48.2 per cent only [*District Census Handbook* (1951), *Dhanbad*, pp. 8-9].

LAND RECLAMATION AND UTILISATION.

Dhanbad has an area of 7,10,119.00 acres only out of which 97,345.00 acres of land are culturable waste lands.† In order to reclaim culturable waste lands, the Bihar Waste Land Reclamation Cultivation and Improvement Act was passed in 1946. The Waste Land Reclamation Section is under the Revenue Department. There is a Waste Land Reclamation Officer for the district whose headquarters is located at Dhanbad. He is under the administrative control of the Deputy Commissioner, Dhanbad.

Manual reclamation of waste land is encouraged by the distribution of Land Improvement Loans. This office maintains the figure of acres reclaimed under Land Improvement Loans.

* Detailed breakdown figures for 1961 census are not yet available (November, 1962).

† As there has not been any expert survey this figure may not be correct. It is not known if any portion of this area could be reclaimed with economic benefit without an enormous initial expenditure.

The following statement has been given by the Waste Land Reclamation Section for the area reclaimed with the help of L. I. loans. On enquiry it was found that there has been no appraisal at the spot if the reclaimed area is under crops.

Years.		Area reclaimed.	Amount advanced.
		Acres.	Rs.
1956-57	..	142.79	12,745.00
1957-58	..	302.22	35,140.00
1958-59	..	445.60	33,221.00
1959-60	..	290.62	24,000.00
1960-61	..	288.31	28,000.00
1961-62	..	145.05	7,500.00

According to the Revenue Department, Waste Land Reclamation Section, Patna Circular no. 4969-W.L.R., dated 15th November 1961, Government have decided to give the grant of subsidy to the cultivators for conversion of waste lands into paddy fields in the laterite tract to encourage the reclamation of waste land into paddy field.

The following statement has been supplied by Waste Land Reclamation Department, Dhanbad for this type of reclamation through subsidy:—

Years.		Area reclaimed.	Amount spent.
		Acres.	Rs.
1956-57	..	50.87	15,087.00
1957-58	..	47.32	10,000.00
1958-59	..	100.00	10,000.00
1959-60	..	100.00	10,000.00
1960-61	..	56.72	3,991.00
1961-62	..	13.73	1,373.00

Here also an investigation disclosed that no spot enquiry has been made later to find out if the reclaimed area has borne any crops.

The following statement supplied by Waste Land Reclamation Department, Dhanbad will show the progress of reclamation done departmentally from 1959-60 to 1961-62:—

Years.		Area reclaimed.	Amount spent.
		Acres.	Rs.
1959-60	..	94.90	6,500.00
1960-61	..	200.55	9,999.59
1961-62	..	94.70	7,000.00

This district has reclaimed 209.89 acres of Government *khas* land till 1961-62. Out of this 102.86 acres have been settled with Harijans and Adivasis and landless men as per Government instructions. There is always the danger of the reclaimed area relapsing into waste again.

IRRIGATION.

The rivers and streams of the district are hilly in character and cannot be used for irrigation unless the water is stored. The

other sources of water-supply are springs, tanks, wells, natural water reservoirs in depressions and *ahars* (artificial reservoirs).

The main source of water is rainfall. The normal rainfall of the district is 55. Rainfall is not a dependable source of water and irrigation facilities are essential.

The system of artificial irrigation prevalent in the district consists of two main types, viz., Medium Irrigation schemes and Minor Irrigation schemes.

A statement of rainfall has been supplied by the Agriculture Department. The total amount of rainfall has been mentioned in inches against the year showing the amount of rainfall from 1946 to 1955. It is as follows:—

Year.	Annual rainfall.
1946	56.89
1947	38.62
1948	51.62
1949	50.40
1950	52.06
1951	42.02
1952	47.27
1953	84.97
1954	49.30
1955	40.26

In 1948 there were 95 rainy days as against 78, 76, 68, 93, 101, 78 and 98 days respectively in the years from 1949 to 1955 respectively. Most of the rainfall is in the months of July, August and September in all these years. 1947 was a drought year when there was a total rainfall of 38.62" only.

During the year 1956 there was a total rainfall of 47.96" as against 32.14" and 57.81" in 1957 and 1958 respectively. The rainfall figures for 1959 were not available in Agricultural Office. The following statement of rainfall in m.m. for 1960 and 1961 has been obtained from the same office. Here also the wet months are July and September.

	1960 in m.m.*	1961 in m.m.
January	0.8	11.1
February	Nil	14.7
March	37.2	0.7
April	Nil	3.1
May	39.1	48.8
June	68.6	215.0
July	328.9	244.9
August	408.2	331.1
September	317.5	251.8
October	74.3	200.8
November	3.7	0.4
December	Nil	0.2

* m.m.=millimetre.

A number of Medium Irrigation schemes have been taken up and executed from time to time to ensure a regular source of water-supply. The schemes are intended more to supply assured irrigation to paddy crop during the intervening drought periods in the *kharif* season. Less is expected from them for irrigating *rabi* crops. Medium schemes normally cost above rupees five thousand and are capable of irrigating more than 100 acres of land. More or less they depend on the rainfall and have generally a catchment area in the mountainous uptracts of various *nullahs* and rivulets.

During the First Five-Year Plan period, two Medium Irrigation schemes were taken up and completed at a cost of about Rs. 1,22,213 benefiting 697 acres of land in the district. During the Second Five-Year Plan period, 14 schemes costing about Rs. 1,94,919 were taken up and completed. They irrigate about 2,161 acres of land in the district. During the Third Five-Year Plan period six schemes are already under execution. These schemes are likely to cost 1,00,000 rupees and to irrigate 1,500 acres of land.

A detailed list of Medium Irrigation schemes already executed and also under execution from 1950 to 1960 is appended herewith.

Medium Irrigation schemes already executed.

Name of scheme.	Location.	Cost in rupees.	Area expected to be benefited in acres.
Sindhambad Irrigation Scheme (repair of old <i>bundhs</i>).	P.-S. Topchanchi	9,867.00	160
Udaipur Irrigation Scheme (repair of old <i>bundhs</i>).	Nirsa ..	33,449.00	300
Sirpuria Irrigation Scheme (repair of old <i>bundhs</i>).	P.-S. Nirsa ..	8,731.00	133
Khesmi Irrigation Scheme (repair of old <i>bundhs</i>).	Topchanchi P.-S.	25,029.00	390
Madaidih I Irrigation Scheme (repair of old <i>bundhs</i>).	Topchanchi P.-S.	8,030.75	186
Phulwar Irrigation Scheme (repair of old <i>bundhs</i>).	Katras ..	7,158.00	110
Baliapur Irrigation Scheme (repair of old <i>bundhs</i>).	Baliapur ..	11,246.37	200
Madaidih II Irrigation Scheme (repair of old <i>bundhs</i>).	Topchanchi ..	5,113.00	176
Luadih Irrigation Scheme (repair of old <i>bundhs</i>).	Nirsa ..	12,543.00	250
Katoria Irrigation Scheme (repair of old <i>bundhs</i>).	Tundi ..	8,550.37	200

Name of scheme.	Location.		Cost in rupees.	Area expected to be benefited in acres.
Dudhinala Irrigation Scheme (construction of <i>bundh</i>).	Katras	..	20,025.00	250
Konartanr Irrigation Scheme (construction of <i>bundh</i>).	Baliapur	..	18,800.00	250
Telmacha Irrigation Scheme (construction of <i>bundh</i>).	Baghmara	..	8,661.62	250
Panjama Irrigation Scheme (construction of <i>bundh</i>).	Govindpur	..	22,729.37	500
Rajbanspahar Irrigation Scheme (construction of <i>bundh</i>).	Katras	..	16,069.60	283
Karampara Irrigation Scheme (construction of <i>bundh</i>).	Katras	..	9,931.30	225
	Total	..	2,33,799.38	3,832

There has been no follow up survey by any department as to how far the schemes have been successful.

Minor schemes.

The topography of the district and the economic resources of the population underline the need for Minor Irrigation schemes which are cheaper and of more local importance. As a matter of fact, the Minor Irrigation schemes have sustained the agricultural economy of the district.

Minor Irrigation schemes include *bundhs*, tanks and *ahars*, as well as repairs to old Minor Irrigation works. These Minor Irrigation works are carried out by three agencies, one under the Revenue Department which undertook 1,376 schemes at a total cost of Rs. 23,50,191.94, the second by Agriculture Department which undertook 360 schemes at a total cost of Rs. 2,00,600 and by the Community Development Department for which figures are not available. Now these works will be carried out by the United Agency for Minor Irrigation. This agency was created in Government Order no. 1DS-0169/59-Agr-30380, dated the 23rd December, 1959/2nd January, 1960. An Additional Director of Agriculture (Engineering) had been appointed to be in charge of this agency. But under letter no. 206-Agriculture, dated 20th January 1962, subsequently the post of Additional Director of Agriculture was upgraded to Chief Engineer (Irrigation). He will be responsible for all Minor and Medium schemes costing up to Rs. 1 lakh throughout the State irrespective of budget heads from which these schemes are financed. The scheme will include the following:—

- (1) Medium *ahars*, *pynes*, *bundhs*, etc., costing between Rs. 10,000 to Rs. 1 lakh.
- (2) Minor *ahars*, *pynes*, *bundhs*, etc., costing up to Rs. 10,000.

- (3) Installation of private tube-wells.
- (4) Open borings with and without strainers.
- (5) Surface percolation wells.
- (6) Distribution of *rahat* pumps.

The following statement shows the construction of wells, minor *ahars*, *pynes* and *bundhs* in the district:—

- (1) Minor *ahars*, *pynes* and *bundhs*—226.
- (2) Medium Irrigation—16.
- (3) Wells—525.

Besides, 13 *rahat* pumps and 35 pumping sets were distributed in the district in the Second Five-Year Plan.

SOILS.

The soil of this district is infertile laterite of no great depth having a general tendency towards continual deterioration, the process being continued till the underlying heavier gravel is exposed. The climatic condition prevailing in the district is of a fairly copious rainfall and high temperature which lead to the formation of lateritic type of soil of the district. Iron, aluminium and manganese oxides are removed less rapidly than the other bases.

According to the texture of the soil, the soils of this district may be classified broadly in four classes:—

- (i) *Stony and gravelly*.—These soils are found near the foot of hillocks which have a large admixture of large fragments of stones, gravels, pebbles, etc. This type of soil may be classed as low grade soil.
- (ii) *Sandy soils*.—These soils are locally known as *bali*. In the district this type of soil is found near river and stream beds. Soils containing more than 60 per cent of sand are classified and are easily drained as they let the water through too readily and necessitates frequent watering. These soils are poor in respect of plant food and require heavy manuring and in frequent doses. On account of dearth of water and manure sandy soils are described as hungry soils. Cattle manure and compost, green manuring and the addition of tank silt and clay will bring about great improvement in the retentive capacity of these soils. The soils are used for growing cucurbits.
- (iii) *Loamy soils*.—This type of soil is found near the hills and formed by rain washing from higher positions and consists of detritus of decomposed rocks and vegetable matter. Soils whose sandy compounds are between 30

and 60 per cent are classed as loamy soils. Agriculturally these soils are best adapted for cultivation. They are suited to every kind of crop but in the district this soil is put under paddy, sugarcane, *marua*, wheat, gram, *khesari*, etc.

(iv) *Clayey soils*.—Such soils are found near tank beds. When moist they are sticky and ploughing and other tillage in that condition will reduce them into a pasty mass. When they are dry they become very hard and difficult to break. They are difficult to drain as the water cannot pass through easily on account of fineness of the particles composing them. They have a high water-holding capacity and are very fertile in respect of plant food contents. The addition of sand, lime, coarse bulky organic manures will improve their physical condition. Nitrogen applied as organic matter and that in the shape of ammonia free or combined as in the ammonium salts applied as manure becomes fixed in the soil, i.e., they do not pass out of the soil in drainage waters.

Paddy is the main crop. The soils for rice cultivation of the district have been differentiated by the cultivator on the basis of their positions into three classes, viz., *baad*, *kanali* and *bahal*.

Baad land.—These lands constitute an area of 0.9 lakh acres (cultivable). These are uplands made by high terraces and dependent entirely on the rainfall much of which percolates rapidly to the lower fields. These lands are sown with early paddy. The soil is poor and need addition of organic manures and fertilisers for better production.

Kanali land.—The area cultivable in the district under this classified land is 0.50 lac acres. These lands are situated between *baad* and *bahal* land. The soil is loamy and medium paddy is grown. For obtaining a good yield organic manures and fertilisers should be added.

Bahal land.—These are the best type of land for growing paddy. They are low lying and they receive enough water through percolation and it is retained. The soil is fertile and rich in plant food. For better production, use of fertilisers and manures are added.

Sometimes high lands situated over *baad* lands are called by cultivators as *tarr* lands. They are fit for *gora*, paddy, *marua*, and ground-nut, etc. These lands are subjected to soil erosion. Bounding properly and checks for soil erosion are necessary for these lands.

Land adjoining to homesteads is known as '*bari*' land. These lands are best suited to vegetables.

The following statement shows the average yield of the crop per acre of different types of soils:—

Types of land.				Crop.	Average yield per acre in mds.	
1. <i>Bahal</i> land	..	..	..	Paddy	..	25
				<i>Khesari</i>	..	5
				Gram	..	5
2. <i>Kanali</i> land	..	..	..	Paddy	..	15
				Gram	..	8
				<i>Khesari</i>	..	4
				Wheat	..	10
3. <i>Baad</i> land	..	..	..	Paddy	..	12
				<i>Marua</i>	..	7
4. <i>Tanr</i> land	..	..	..	Maize	..	8
				Millets	..	6
				<i>Rahar</i>	..	6
				Oil-seeds	..	5

Soil Erosion.

The causes of soil erosion in this district may be enumerated as given below:—

- (a) *Rainfall*.—The area is a rainfed area, the total average rainfall being 55". The intensity of precipitation is concentrated in a short period and in a short time.
- (b) *Running water*.—Due to steep slopes and high intensity of precipitation the run-off water runs at a speed which removes the soil.
- (c) *Slopes*.—The slopes of the land of the district are quite prominent.
- (d) *Nature of the soil*.—Once the run-off water makes the path in the lateritic type of soil it proceeds rapidly and assumes serious proportions till gullies reach the bed rock.
- (e) *Ploughing*.—Deep ploughing is not possible due to rocky construction of the soil and as such moisture is not retained in the sub-soil but are allowed to drain. The cultivators practise ploughing along the slope on *tanr* land which induces and accelerates soil erosion.
- (f) Lack of contour-bunding which leads to a quick run-off of the rain water causing erosion.

Hardly any steps for constructing soil erosion have been taken by the cultivators. In a district like this such steps are expensive. A few plots here and there have been bunded and levelled but no planned large scale steps are visible anywhere in the district. The land with reference to soil has to be surveyed and proper land use

to be made and proper drainage channels have to be made. Agricultural operations and cropping patterns have to be considerably altered to stop soil erosion.

PRINCIPAL CROPS.

The crops of the district fall under three main harvest: *aghani*, *bhadai* and *rabi*. The *aghani* is the winter crop which is cut in the month of *Aghan* and is composed mainly of winter rice. The *bhadai* is the early or autumn crop, reaped in the month of *Bhado* (August-September) consisting of 60 days' (*sathi*) rice, *gora* paddy, *marua*, maize and less important grains; while the *rabi* crop includes such cold weather crops as wheat, barley, oats, grams, pulses, etc.

Paddy.

Paddy is the important crop of this district. Transplantation method is generally used. The broadcast method is rarely practised except in small patches spread over the district for growing *gora* paddy on *tanr* lands. It is sown in every part of the district.

The following figures supplied by Statistics Department, Dhanbad, show the acreage and outturn of winter rice in the district from 1958-59 to 1961-62:—

Years.		Area in acres.	Outturn in tons.
1958-59	..	1,94,121.36	92,060
1959-60	..	1,99,585.32	1,10,748
1960-61	..	2,29,073	1,30,899
1961-62	..	2,30,545	1,17,803

The early months of spring are the most suitable time for preparing land not bearing a second crop, by repeated ploughing.

In the last week of May and 1st week of June, after a good shower the field for cultivation is ploughed about four times and the paddy seed is thickly scattered over it for raising seedlings. When the seedlings are ready the field where transplanting is to be done is prepared by repeated ploughing and puddling. The rain usually sets in by the second week of July and the land retains the major portion of water in it. It is repeatedly ploughed and puddled and the whole field is reduced to thick mud. The young seedlings are then taken out of the nursery and transplanted in rows at about a distance of 8 to 10 inches.

Bhadai or autumn rice is generally sown on high land. The field is ploughed 10 to 12 times after the first showers of spring and seed is transplanted and rarely broadcast either in April or May.

Storage.

The grains are kept in bundhs prepared by twisting the straw to form ropes that are bound round and round to form a spherical basket closed on all sides. This is a primitive and cheap method but quite useful. There are no warehouse facilities to the average cultivators. There is no doubt that a considerable portion of the paddy is lost by faulty storage.

Wheat.

Wheat is the most important *rabi* crop. It requires a clayey soil of medium elevation. The sowing starts from the middle of October and it continues up to the end of December. The harvesting starts from the month of March and continues up to April. The figures below have been supplied by the Agriculture Department, Dhanbad regarding the acreage and outturn of wheat:—

Year.		Area in acres.	Outturn in maunds.
1958-59	..	497.27	2,490
1959-60	..	566.35	2,830
1960-61	..	218.03	1,095
1961-62	..	147.00	835

The statement showing the areas and yield of some other crops from 1958-59 to 1961-62 has been supplied:—

Year.		Area in acres.	Outturn in maunds.
<i>Barley.</i>			
1958-59	..	455.5	2,275
1959-60	..	82.80	410
1960-61	..	49.06	245
1961-62	..	54.00	270
<i>Gram.</i>			
1958-59	..	46.68	230
1959-60	..	377.64	1,885
1960-61	..	471.23	2,355
1961-62	..	396.00	1,980
<i>Maize.</i>			
1958-59	..	11,432.23	91,456
1959-60	..	13,215.69	1,05,720
1960-61	..	13,731.00	1,09,848
1961-62	..	13,803.00	1,10,424

SUGARCANE.

Among non-food crops sugarcane is most important although there is very small cultivation of it. The following figures supplied by Agriculture Department, Dhanbad shows the acreage and outturn of Sugarcane in the district:—

Year.		Area in acres.	Outturn in maunds.
1958-59	.. ..	306.65	61,200
1959-60	.. ..	257.66	51,400
1960-61	.. ..	268.00	53,600
1961-62	.. ..	214.00	42,800

VEGETABLES AND FRUITS.

Vegetables and fruits locally grown are in great short supply. The district's needs are met from Ranchi, Gaya, Patna, Biharsharif, etc. The industrialisation of the district has led to an expansion of population. More and more of lands used for growing vegetables and crops are coming under industrialisation.

The important vegetables commonly grown are potato, brinjal, lady's finger, tomato, chillies, cauliflower, cabbage, beans, sweet potato and spinachs, etc.

Among fruits mangoes, guavas, papayas, jack-fruits, lemons, black-berries, plums, custard apples, bananas are commonly grown. But the varieties are not of very superior quality. A huge quantity of fruits is imported into the district through roadways and railways. Fruits are not cheap and usually do not form an item in the common man's menu.

ARBORICULTURE.

Different kinds of trees are found on the roadsides. Some of them, namely, mango, *jamun*, *pipal*, *palash*, *kachanar*, *amaltash*, *ashok*, *sirish*, *sakhua*, *kathul* and *shisho*. *Kachnar*, *shisho* and *sakhua*, etc., are generally found on either side of the Grand Trunk and other roads. Some of them bear fruits and flowers and offer good shade. Some of the roads in Dhanbad town have got old trees, viz., *amaltash* and *krishna chura*. They could be alternately planted by the side of the roads to offer beautiful yellow and red flowers in the summer. In Dhanbad town, Sindri, Panchet and Maithon, there are trees of *amaltash* and *krishna chura* which present a good sight of yellow and red flowers in summer. There is ample need and scope for arboriculture in the district. It is unfortunate that many of the old trees by the roadsides are declining and are not being replaced. Some collieries and industrial concerns had attractive gardens with selective trees. But many of the present managers and owners have

not taken much interest in them. The new townships like Sindri, Maithon, etc., have, however, paid some attention to the planting of trees.

Regarding gardens and flowers, the taste and craze are on the decline. Good species of roses could be grown in Dhanbad soil and there used to be good rose-gardens in some of the collieries previously. Winter annuals are found in many gardens in the urban areas. Maithon bungalows have good gardens and are examples.

AGRICULTURAL IMPLEMENTS.

The primitive indigenous agricultural implements are still largely used. The country ploughs made locally by the village carpenters still hold the market. Attempts are being made to introduce better implements through the Agriculture Department.

The approximate cost of an indigenous plough with other implements is Rs. 20 to Rs. 25. Other implements used are spade, sickle and *khurpi* costing Rs. 2 to Rs. 10 respectively.

The State Department of Agriculture has introduced a set of new and improved implements such as senior and junior Bihar plough, *sukhda* plough, junior ridging plough, etc., and they are slowly becoming popular among the cultivators.

These are used if soil inversion is necessary or undesirable plants are grown in the field or for ploughing every bit of land for deep ploughing.

Some of the other new implements in use are Japanese paddy weeder, cutter for fodder and maize sheller. They have contributed to better agriculture.

The main difficulty in the use of the better implements such as Bihar junior plough, Bihar senior ridging plough and the *sukhda* plough are the poor and small size of bullocks.

SEEDS.

The cultivators generally reserve a certain portion of their field produce for use as seed. Several varieties of improved seeds have been obtained either by selection or hybridisation by the Department of Agriculture, Bihar, at its research stations in the State or imported from other research stations in other parts of India. Several imported seeds have been given trial under local conditions and have been recommended to replace local seeds.

Seed Multiplication Scheme has been taken up for multiplying better type of seeds to introduce them to the farmers. The aim of the Government has been to open a Seed Multiplication Farm at each Block headquarters. There are Seed Multiplication Farms at Seraidhela, Tundi, Ratanpur, Podardih, Bhekrampur, Alakhdiha Bakashpura, Topchanchi and a District Farm at Balliapur.

Seed Multiplication Farms receive pedigree seeds from Kanker Farm, Ranchi. These seeds are multiplied at the Seed Multiplication Farms and the multiplied seeds are supplied to the big cultivators. They multiply the seeds in their fields under the supervision and guidance of the village level workers who are trained personnel in the agricultural field.

The farmers and the Block Development Officers have an agreement that the seeds produced will be exchanged with the general cultivators for multiplication purpose. They get Re. 1 as premium for each maund of seeds exchanged or sold with general cultivators.

MANURES.

Cow-dung, the droppings of sheep and goats and farm refuse are common manures.

In the rural areas the cultivators prepare their own compost. Cow-dung, farm refuse, etc., are collected in a pit and are allowed to decompose to form compost. The pits are opened after one year and the compost is taken to the field.

The outskirts of the urban areas are used by the municipal bodies and notified area committee to prepare town compost out of the sweepings and night soil. The apathy of the cultivators to use this type of manure is now being liquidated. Chemical manures are also made available in Credit Agricole Depots and Co-operative Societies. Leaf manure and the use of certain manure crops like *sarai* and *dhaincha*, etc., are also in use to some extent. The use of manure is neither extensive nor intensive.

ROTATION OF CROPS.

The cultivators are fully conscious of the beneficial effects of rotation of crops. This is done to maintain the fertility of the soil and to remove insects and pests from the soil. Crop rotation also controls the incidence of crop disease and growth weeds.

RABI.

Rabi crops like wheat, barley, gram, etc., are not grown to any large extent. It is only irrigational facilities are available that such crops could grow more.

MIXED CROPPING.

Grouping of two or more crops together in one and the same field instead of growing them separately is called mixed cropping. The usual mixed cropping pattern is as follows:—

- (1) *Marua* and ground-nut.
- (2) *Marua* and *arhar*.
- (3) *Rahar* and *moong* or *urid*.

PESTS AND DISEASES.

There are many factors that damage crops. Some of them like cyclones, untimely rain, very heavy rain, drought, intense cold are not absolutely controllable. Animals and birds are also damaging factors. Occasional visits of locusts damage crops heavily. There are a number of insects, pests and diseases (fungus or bacterial) that may ruin the crops. Some of the insects are ants, caterpillars, locusts, crickets, grass-hoppers, termites, beetles, hoppers, paddy hispa, paddy bug, potato sloth, hairy caterpillar, etc. They are to be controlled by judicious use of various insecticides. Resistant varieties of seeds have to be used in some cases. In some cases seed and the soil have to be treated at the beginning.

Some of the common diseases of plants and crops are, barley foot-rot, paddy blast, paddy leaf spot, foot-rot of paddy, early or late blight of potato, sugarcane smut, sugarcane red rot, wheat foot-rot, stem rust of wheat, leaf rust of wheat. Various insecticides are recommended to fight these diseases. In some cases the seeds have to be dressed with insecticides before sowing. For some diseases leaves have to be dusted with insecticides and the use of resistant varieties of seeds is recommended.

There is a plant protection section of the Agriculture Department to educate the cultivators and to make the insecticides available to them. From a investigation in some of the villages it was found that it is not always easy or financially possible for the cultivators to utilise the services of this section. There are a number of specialists known as Subject-matter Specialists under the District Agricultural Officer and they are meant to carry the benefits of modern research to the cultivators at the villages. This object can only be achieved if the Subject-matter Specialists are well equipped themselves and are keen on their work. No soil survey work has yet been done in Dhanbad district and there are no soil maps. The traditional techniques of agriculture are still a dead weight on the agriculturists and not much has yet been done to acquaint them with the results of modern researches. This fact was all the more apparent when investigations were made as to the improvements done so far as horticulture in this district is concerned. There is a horticultural section under the Agriculture Department and very little has yet been done to lay new orchards or to rejuvenate old orchards or in laying different new vegetable belts. It is not known if any new varieties of vegetables have been introduced in the district in the last 20 years.

ANIMAL HUSBANDRY AND FISHERIES.

The livestock in this district is generally of a poor variety. Not much pasturage is available although there are stretches of jungle. There is not much popular response to improve the breed of the livestock.

The following table indicates the livestock population from 1920 onwards:—

Years.	Total cattle.	Buffaloes.	Sheep.	Goats.	Pigs.
1	2	3	4	5	6
1920	8,03,823	1,44,772	1,42,807	2,32,833	Not available.
1925	7,57,637	1,47,396	1,29,461	2,19,970	Ditto.
1930	8,02,035	1,85,425	1,64,098	3,78,034	Ditto.
1940	7,90,940	1,45,002	1,81,228	3,54,328	37,050
1945*	6,34,481	1,69,535	1,37,348	2,11,764	25,801
1951	2,17,269	38,422	49,027	90,810	19,549
1956	2,92,808	55,384	75,278	1,25,151	16,943

The figures of 1956 as compared with 1951 show an increase in all the heads excepting pigs. A mere increase in the number may not mean a corresponding increase in the cattle wealth. The figure of goat population in 1956 as compared with 1951 shows that there is an increase of about 34,341 in five years. Goats are the worst enemies of crops.

The State Government have decided to encourage people for keeping more pigs during the Third Five-Year Plan. There is an idea of pig utilisation by the preparation of pork, ham and bacon.

A detailed classification of bulls for Dhanbad district only according to 1956 livestock census is given below:—

Bulls over three years.†

	Cattle.				Buffaloes.			
	Breeding bulls.	Working bulls.	Other bulls.	Total.	Breeding bulls.	Working bulls.	Other bulls.	Total.
1	2	3	4	5	6	7	8	9
Rural ..	1,792	1,02,507	6,571	1,10,930	1,650	29,745	2,227	33,622
Urban	9	274	4	287	4	208	2	214
Total ..	1,801	1,02,841	6,575	1,11,217	1,654	29,953	2,229	33,836

* The figures up to 1945 have been given for the whole Manbhum district as the figures of Dhanbad sub-district are not available. Later figures are only for Dhanbad district (*District Census Handbook, Dhanbad, 1951, pages 100 to 101*).

† Statement of figures taken from the report on *Livestock Census of 1956, pages 194 to 199*.

The above figures disclose that the number of breeding bulls, both in cattle and buffaloes are less than that of working bulls.

A detailed description of cows over three years according to live-stock census of 1956 is given below:—

Cattle.

	In milk.	Dry.	Not calved.	For work	Others.	Total.
1	2	3	4	5	6	7
Rural	30,048	33,189	12,522	1,923	2,205	79,887
Urban	983	381	72	50	41	1,527
Total	31,031	33,570	12,594	1,973	2,246	81,414

Buffaloes.

	In milk.	Dry.	Not calved.	For work	Others.	Total.
1	2	3	4	5	6	7
Rural	4,308	2,573	1,090	882	334	9,187
Urban	778	161	33	23	2	997
Total	5,086	2,734	1,123	905	336	10,184

The population of dry cattle is more than the population of cattle in milk whereas the dry buffaloes is less than the population of buffaloes in milk.

Fodder Crops.

The straw of cereals is generally used as food for cattle. There is no reliable record to indicate the area under fodder crops. For encouraging the cultivation of fodder crops the Agriculture Department has been laying out demonstration plots and distributing seeds and cuttings of fodder crops. Very little progress has been made so far. In 1960-61, only 153.85 acres were laid out and 48 maunds of improved fodder cuttings and 52 maunds of seeds were distributed.

Dairy Farming.

Dairy farming has not yet been well developed in this district. Two privately managed *goshalas*, one at Jharria and Katras maintain a certain number of cows and buffaloes and are private organisations. They supply only a few maunds of milk to Dhanbad town. The Co-operative Milk Union at Basora does not keep any cattle and purchases milk from the milkmen residing in different parts of the areas

and the supply of milk is made. It is said that the purity of milk is tested before the supply is done. This is, however, a poor specimen of the fulfilment of the objective.

Supply of milk is still in the hands of *goalas* who are professional cow herds. Milk is becoming a problem in the district.

Sheep Breeding.

Sheep breeding could be a useful subsidiary occupation. There are *gareris* who belong to a shepherd caste and are professional sheep-breeders. The census figure would show that the sheep population has been declining although there was a somewhat revival in 1956. The Animal Husbandry Section could give no reason for this. Wool from the sheep has a ready market and particularly in Hazaribagh Central Jail. Mutton is also in great demand. It is doubtful if the census figures are very correct.

Poultry Farming.

The aboriginals of the district keep poultry as a matter of routine. The economically backward Muslims also keep poultry and derive a side-income. There is a great demand for good birds and eggs throughout the district. There is an abundance of scope for development of the poultry farming. There is one Government poultry farm at Dhanbad and five hatching poultry centres at Govindpur, Nirsa, Tundi, Topchanchi and Chas. There are five private poultry farms, two are at Dhanbad proper, one at Nagnagar, one at Chirkunda and one at Maithon. The Community Development Blocks are expected to encourage poultry rearing but not much appeared to have been done so far.

Livestock census figure of poultry from 1945 to 1961 is as follows:—

1945	..	..	..	1,13,803
1951	..	..	..	1,57,850
1956	..	..	..	1,89,528
1961	..	..	..	4,30,714

If the figures are correct, there has been some development in poultry rearing. It may, however, be observed that the hatching centres have not yet been able to improve the breed of the birds. During the years 1956-57 to 1961-62 only 9,554 birds have been distributed for breeding purposes. It is a notorious fact that not all birds so distributed are used for that purpose.

The price of a roast chicken in Dhanbad is near about Rs. 3 to Rs. 4.

Measures to improve the quality of Breeds of Animals.

Efforts are being made by the State Government to improve the quality of breeds of animals by distribution of bulls of improved

varieties, Yorkshire boars, etc., and by the opening of artificial insemination. There are artificial insemination centres at Dhanbad and Sindri with sub-centres at Govindpur, Nirsa and Topchanchi. Annually District Cattle Show at Dhanbad is organised. It cannot, however, be said that the measures have had any substantial achievement.

Animal Diseases and Veterinary Hospitals.

The diseases, from which animals generally suffer in the district are rinderpest, septicaemia, anthrax, blackquarter and foot and mouth diseases. All outbreaks are attended to promptly with sera and vaccine. Mass inoculation is done against these diseases for which specific vaccines are available.

The following figures of vaccination against these diseases in 1960-61 and 1961-62 have been supplied by the Animal Husbandry Department:—

Year.	Rinderpest.	Haemorrhagic septicaemia.	Anthrax	Black quarter.
1960-61	7,894	6,844	2,709	3,714
1961-62	Nd	7,971	14,008	3,741

In the district of Dhanbad, there is one Veterinary Hospital at Dhanbad and Class I dispensaries are at the following places:—

- (1) Govindpur, (2) Nirsa, (3) Tundi, (4) Topchanchi,
 (5) Kenduadih, (6) Chandankeari, (7) Baliapur,
 (8) Sindri, (9) Baghmara, (10) Katras, (11) Rajganj,
 (12) Jorapokhar.

Fisheries.

The rivers, streams, low-lying fields which accumulate water in the rainy season, ponds and marshes indicate a rich potentiality for fish. There are 3,513 such tanks in the whole district reported by Fisheries Department, Dhanbad. The recent rehabilitation of some displaced families from East Pakistan belonging to fishermen class near about Barakar and Damodar rivers has given a great incentive to fish culture. These displaced Bengali fishermen are experts in catching fish with their large net (*mahajal*) from which fish could hardly escape. The presence of ice factory and a large fish-consuming public indicate an assured consumption of large quantities of fish within the district.

The State Government has taken up a scheme for development of fisheries. One Inspector of Fisheries has been appointed under the administrative control of the District Agricultural Officer. The Fishery Inspector is expected to look after the development and exploitation of suitable water reservoirs in the district. He is also required to look after the welfare of the fishermen and to do a necessary amount of propaganda and demonstrations. The achievement so far has been imperceptible and the condition of the fisheries and the fishermen continues to be almost the same as it was two or three decades back. No active Fishermen's Co-operatives have been functioning and the middle men continue to exploit the poor fishermen. There has been no serious attempt to tap the paddy fields which can grow a large quantity of fish. No attempt has been made to introduce new varieties of fish. On the other hand many of the species are on the decline.

The main occupation of the men belonging to the castes Mallahs, Keuts, Banpars or Tiars is to catch fish and do other allied work for marketing fish. There are regular fishing villages in this district mostly located by the Barakar and Damodar river side. Fishermen usually live in a distinct *tola* or *tolas* of the village or town. This is the case at Chas, Baghmara and Nirsa. According to the census conducted by Fishery Department the total population of fishermen in the district came about 4,464. The bulk of their catch is sold to a few traders who belong to other castes, such as, Gwalas, Kurmis and Muslims. These are big traders who directly export and import fish. Quite a large quantity of fish is received in Dhanbad market everyday from the other side of Bihar, Uttar Pradesh, West Bengal and Bombay. Occasionally, particular kinds of fish like lobsters, *hilsa*, and *bhetki*, etc., packed in ice are imported from Calcutta. Fresh fish from Maithon area is exported to Asansol and Calcutta.

In Dhanbad town fish first goes to the wholesale fish market at Purana Bazar at Dhanbad and Jharia. From these markets fish is sent to retailers on auction basis.

The chief fish markets and trade centres in the district are at Jharia, Katras, Sindri, Chirkunda and Dhanbad. The following are some of the species of fish that are commonly available: *rohu*, *katla*, *boari*, *tengara*, *hilsa*, *bachwa*, *jhinga*, carp, featherbacks, *murrels*, *mrigal*, *pangas* and prawn, etc. A variety of small fish called *pothia* is also common here.

In this district two types of crafts, viz., (i) dug out canoes and (ii) plant built boats are used for catching fish in Maithon and Panchet dam. Dug out canoes which ply in the rivers are stable and cheap. Plank built boats of various types are used in the strong current of large rivers like Barakar and Damodar. The small canoes are commonly used for catching *hilsa*, prawn, etc. Various types of nets and spears are used for catching fish.

The average daily consumption of fish as reported by the Inspector of Fisheries in the whole of Dhanbad district according to season is given below:—

January to March—400 maunds.

April to June—350 maunds.

July to August—300 maunds.

September to December—500 maunds.

This estimate does not seem to be very correct. On enquiry it was found that in Dhanbad district about 1,00,000 maunds of fish are imported yearly from other parts of the State and outside State. With the implementation of new irrigational development schemes, which have a direct or indirect bearing on fisheries, pisciculture is bound to gain more importance in this region. The Ice Factories in Dhanbad sell daily about 500 maunds of ice for the fish trade. Fish is not salted for sale.

There is some reluctance among the younger generation of Mallahs to take to fish trade. On getting some education they, like other educated youngmen hanker after soft collared jobs and desert the profession of catching fish. The other obstacle that stands in the way of the development of fishery industry is the lack of capital amongst the fishermen.

FORESTS.

The forests of Dhanbad district extend over an area of 104.96 square miles in 1962.

Sadar subdivision has 62.36 square miles and Baghmara subdivision 42.60 square miles of area under forest. The total area of the district is 1,114 square miles. The area under forest is very small. The forests of this district are mostly in Tundi, Topchanchi, Govindpur and Nirsa areas which are to the north-east of the district.

Forest Management.

Formerly when forests covered most of the land surface and clearance of jungle was necessary or laudatory, nobody cared as to what happened to the forest. Cutting went on without let or hindrance. As the population grew, more cutting took place and denudation was the result.

The Government-owned forests in Tundi and Topchanchi *thanas* were constituted reserved or protected forests and given protection and scientific management. The rest belonged to the *zamindars* who exploited them for money. The crisis was reached during the period of the Second World War. An unlimited demand for timber and poles arose from the coal mines area and those forests being the most accessible received the full brunt of the fury of cutting. Indiscriminate fellings went on everywhere and almost all the good timber was cut and removed. Efforts had earlier been made in this

district, as elsewhere in Bihar, to induce private forests owners to come to an agreement with Government under the provisions of section 38 of the Indian Forest Act for scientific management of their forests on terms sufficiently advantageous to them. But the owners were not very agreeable. They accordingly held out. Seeing that the conditions had already deteriorated to a point of almost irretrievable damage to the national property, Government had to step in and the Private Forests Act of 1946 was enacted. The Forest Act had received a wide publicity during its bill stage and people hurried in all corners to lay by what they could before as they mistakenly understood. Provisions of the Forest Act also proved unequal to the occasion. For over an unavoidable period of formalities the forest almost hung in the air, it was taken away from the owners but not taken over by Government and nobody could effectively protect it. The Forest Department Officers and men had to work against an overwhelming tide of psychological and physical opposition both from the owners and the people in general—the owners opposed and spread disaffection against Government and the Forest Department because they did not relish the forests being taken away from their hands; the people opposed because although they would gain in the long run by the continued existence of the forest, they were subjected to control and regulation. Ultimately in 1950 the Bihar Land Reforms Act came into operation and all the private forests vested in the State. Now the entire forest area in Dhanbad district is the property of the State. Scientific management has been extended to all the forests.

Description of the Forests.

The predominant species is *sal*. The *sal* forests will have to be rehabilitated. At present pole size, namely, $1\frac{1}{2}$ to $2\frac{1}{2}$ feet in girth, is common but over extensive areas only saplings exist.

Bamboo is an important associate of the *sal* tree. Bamboo is not uniformly distributed but occurs in special localities. The chief locality is the region from Govindpur to Chandankeari. The entire bamboo area needs rehabilitation.

Simul is fast reaching a state of extinction because it has been very extensively cut both for the match factory and for packing purposes.

Mahua is another tree that commonly occurs in this forest, particularly on the fringes. *Mahua* flower is much prized as an item almost of staple food for the poorer class for a part of the year. Elsewhere also the people supplement their food by *mahua* flower and the rest goes to the distilleries. Its seed also yields useful oil. The local population use it sometimes for cooking purposes or for lighting and the trade uses it in the soap industry.

Palas also occurs plentifully in restricted localities chiefly in Govindpur, Tundi and Topchanchi areas. It is an important specie, for cultivation of lac.

Kusum is another important lac-host but it occurs scattered about and not in groups or patches like *palas*. *Kusumi* lac is about the best in quality.

Trees of *harre*, *bahera* and *amla* jointly yield the well known myrobalan trade. These myrobalans are used chiefly for tanning industry and there is a sizeable export trade in this commodity. Myrobalans also are used in restricted quantities in Ayurvedic medicinal system for manufacture of *triphala*, a decoction used as a purgative.

Kend is another species of almost universal occurrence. It is prized for its fruit which the local people eat with relish. It ripens in April-May when the paddy stock runs short and thus comes in handy as a supplement to food. The timber of this tree yields ebony which is much fancied in furniture trade, but only big trees yield ebony in substantial quantity for it comes out of the very core of her wood. Big trees capable of yielding ebony are not common.

Asau is utilised for growing tassar cocoon. *Sal* is also a secondary species for cocoon rearing.

Piar is also quite common and is prized for its fruit. The pulp is eaten and the kernel of the seed is used in the preparation of sweets.

Bhelwa fruits when ripe and dry are also eaten, specially in the forests of Tundi and Topchanchi areas. The seed is the common *dhobi's* nut—it yields an acrid juice which indelibly marks cloth.

The names of a few of the other common species that generally occur in the forest of Dhanbad district are: *paisar*, *gamhar*, *bhukund*, *semul*, *karam*, *bet*, *malasur*, *siris*, *dhanna*, *jaba*, *kachmar*, *kasai*, *bhukusumi*, *sonari*, *putri*, *makarkend*, *jamun* *papra*, *korajia* or *kurchi*, *jirhut*, *bankaparia*, *kamla*, *doka*, *fensena*, *rohin*, *roronga*, *dhabai*, *ber*, *kathber*, *khajur*, *sidha*, *kahua*, *chireta* and *parjan*.

Most of these forests are burdened with rights. The general rule is that the inhabitants of a village within the cadastral boundaries of which the forest is situated have the right to take for their own *bona fide* use, but not for sale or barter, whatever forest produce they may require. The management of forests is therefore so designed that the requirements of these right-holders are first implemented and the surplus is sold for use of those who have no rights or for export to other markets.

Revenue.

The revenue derived from the forests in Dhanbad district from the year 1957-58 to 1961-62 is as follows:—

Years.				Rupees.
1957-58	..	..	..	78,889
1958-59	..	..	..	70,248
1959-60	..	..	..	49,348
1960-61	..	..	..	1,28,342
1961-62	..	..	..	1,28,422

Afforestation.

As has been said in the foregoing paragraphs, large stretches of land which once were covered with fine forests have since decades been completely denuded of all vegetation and stand out as desolate brown wastes on which not even grasses can grow. Large parts of such wastes have been gullied and deep ravines formed therein. For reclothing such denuded land and for arresting the progress of gully formation, afforestation schemes have been taken up. Afforestation has only recently been started and has been carried out at Chas and Topchanchi areas. The scheme is to afforest 2,000 acres annually.

STATE ASSISTANCE TO AGRICULTURISTS.

Loans to the cultivators for relief of distress, purchase of seed or cattle or any other purpose connected with agricultural objects are given by the State Government through the District Magistrates and the Subdivisional Magistrates under the Agriculturists Loans Act XII of 1884 and Land Improvement Loans Act XIX of 1883. The loans are repayable in instalments within a period not exceeding twenty years. There are a number of requirements which have to be fulfilled before any loans are granted and the formalities are looked upon with disfavour. The formalities are necessary for security of repayment but the delays could be cut down. There is hardly any check to see that the money advanced is properly utilised. It may be mentioned that the village *mahajans* have not been liquidated at all and cultivators still prefer to go to them as they grant loans much more quickly although the rate of interest is much higher.

The following statement of disbursement of loans has been received from the Deputy Commissioner's Office:—

Year.					Allotment received.	Loan advanced.
					Rs.	Rs.
<i>Agricultural Loans.</i>						
1958-59	.	..	..	..	7,00,000.00	6,41,000.00
1959-60	..	..	..	..	2,15,000.00	2,13,000.00
1960-61	..	..	..	..	80,000.00	77,000.00
1961-62	..	..	..	..	80,000.00	64,870.00
<i>Land Improvement Loans.</i>						
1958-59	..	..	..	..	1,50,000.00	81,691.00
1959-60	..	..	..	..	30,000.00	24,540.00
1960-61	..	..	..	..	30,000.00	17,000.00
1961-62	..	..	..	..	20,000.00	9,080.00

NATURAL CALAMITIES.

Agriculture in Dhanbad district is still very much subject to the local rainfall. Any deficiency or excess of rainfall or untimely distribution will lead to conditions adverse to agriculture and there may be failure of crops. The district is not subject to floods but is very much subject to droughts. There have been periods of famine and acute economic distress from time to time.

*Famine of 1866**

The immediate causes of the famine was an excess of rainfall in the earlier part of the monsoon period which hampered agricultural operations and ruined the crops. This was followed by a sudden and early cessation of rain which practically destroyed the monsoon and the winter crops. The harvest of 1863 and 1864 also had been below average and the failure of these crops caused a severe famine. The distress was very great. We find that the Deputy Commissioner of the district of Manbhum in his letter no. 822, dated the 28th August, 1866, wrote to the Assistant Commissioner of the then Gobindpur subdivision (now a part of Sadar subdivision, Dhanbad) that the *zamindar* of Jharia had reported 600 deaths in the *pargana* from starvation and that the Rani of Pandra was feeding 1,700 starving people daily and similar reports were being received from other quarters. He wanted rice to be procured from Bancorrah and other area.

The situation was aggravated by the *moodis* who had hoarded grain and grain depots were opened at Govindpur and other places. To meet the situation rice was distributed to the incapacitated and labour on wages was utilised in making a road connecting Jharia with Govindpur, joining the road to Ranchi.

Famine of 1867†

The famine conditions prevailing in 1866 continued in 1867. But timely rain in that year was a boon and the price of rice fell to 27 seers a rupee from 7 seers a rupee.

Famine of 1874.

There was insufficient or almost no rain in the months of June, July, August and September in 1873. The result was a crop estimated at only half the normal for the district as a whole. The price of rice rose from 15½ seers in January to 13 seers in April when Government importations had begun to arrive. During April the ripening of the *mahua* harvest prevented a further increase of distress, the *mahua* blossoms affording cheap food to the poorer classes. Meantime the relief works had already been started on a small scale in February. Relief works were taken up and doles were also given.

* Old English Correspondence, Vol. no. 57/95A, Manbhum, 1866-67.

† Old English Correspondence, Vol. no. 57/37, Manbhum, 1867-68.

By September the position became much better and the relief works were closed down. With the advent of the first of the new crop in the market prices quickly fell in November and December to 22 and 24 seers and any cause for further anxiety had entirely passed away.

Scarcity in 1892.

Rainfall in 1892 was deficient and badly distributed and in consequence the outturn of both the autumn and winter crops was poor. In the previous year there had been crop below the average and prices had generally risen. The district was, however, just then being opened out by railways and the mining industry was beginning to develop and in consequence the demand for labour was considerable. There was scarcity in some pockets only.

Famine of 1897.

In 1895-96 the rainfall was small. The *bhadai* crop was an average one and the winter crop was poor. The result was that prices had begun to rise as early as the beginning of 1896, and by September had risen to 11 seers at Govindpur. In the Govindpur (Dhanbad) subdivision conditions were more favourable but in the two succeeding months the rainfall was in marked deficiency. The fall in September was not sufficient and October was absolutely rainless. The result was that the outturn of *bhadai* crops was only half of the normal, and of winter rice less. To add to the misfortune the *mahua* crop was seriously damaged by the untimely rain in March, 1897. Prices had by that time risen to 9 seers at Govindpur, and gratuitous relief to beggars and wanderers was necessary. By the third week of February gratuitous relief was being administered to nearly 4,500 persons and test works were opened in Govindpur, Tundi and Chas. The price of rice had risen to 8½ seers per rupee in April, and by the end of May only 7½ seers were obtainable at Govindpur which reached as high as 7 seers per rupee at the end of the latter month. Relief works were given to many people during May and June and till November manual works and gratuitous relief centres were opened and relief was given to the people at large. The prices of commodities began falling then and the prospects of the new crops assured and at the end of October the operations were finally closed. Dr. A. Campbell of the Free Church of Scotland Mission at Pokhuria did a very useful and unostentatious work in this connection.

Later History.

Since 1897 there were comparatively short crops in 1904-05, 1906-07 and 1907-08 and in the last year the situation was one which gave rise to considerable anxiety in certain pockets more remote from the railways. As early as October, 1907 the price of rice had risen to 7 seers per rupee. There was also a severe epidemic of cholera originating from the coalfields. The distress forced many people to sell part of their holdings. Loans were distributed under the Agriculturists' Loans Act and the Land Improvement Loans Act.

Distress in 1920-21.

During 1920-21 there was drought in Dhanbad. Heavy rains in the early part of the monsoon proved disastrous to the *bhadai* crop and the complete cessation of the rains in September seriously affected the winter rice and *rubi*.

1933-34.—During 1933-34, *mahua*, an important food crop suffered considerably from drought and hailstorms. The earthquake did some damage to standing crops. Rivers and tanks were silted up, wells were choked with sand and some were completely ruined. The earthquake on January 15, 1934 did not affect the agricultural operations very badly but threw the normal conditions out of gear from some time. The rate of wages fell abnormally and affected agricultural operations.

1940-41.—There was a partial failure of crops due to want of timely rainfall, but on the other hand the rise in the prices of food-grains due to the war and the reduction of rents of holdings benefited the agriculturists to some extent.

The prices of rice and other necessities of life showed an upward trend but measures to control prices, initiated under instructions of Government, checked profiteering to some extent.

There was indication of distress among the people of Topchanchi *thana* in Dhanbad subdivision due to failure of rain and Rs. 7,000 was granted under Land Improvement Loans Act. Dhanbad Local Board also sanctioned Rs. 2,500 for Topchanchi-Katras Road to find employment for the people.

1943-44.—The paddy crop was not satisfactory in Dhanbad. Owing to Second World War the prices of all commodities and food stuffs reached a considerable higher level, but Price Control Measures acted as a check. The price of coal also rose due to scarcity of wages and increased demand by various industrial concerns.

1945-46.—The *bhadai* and winter rice crops failed. Though the Second World War ended but the prices were at the same high level and especially of rice rose considerably due to acute food shortage.

Distress during 1957-58 to 1958-59.

The years 1957-58 to 1958-59 were, however, a period of rather acute economic scarcity. The cause of distress was due to failure of *bhadai* crops and damage of *aghani* crops due to late transplantation and failure of *Hathia* rains. The extent of failure of harvest was almost 50 per cent.

Relief operations were started in the month of October, 1957. In order to co-ordinate the relief operations at different centres, a District Relief Committee consisting of officials and non-officials was formed in 1957. The areas that were declared to be more distressed

were Nirsa, Chirkunda, Tundi, Jogta, Jorapokhar, Baliapur, Kenduadih and Govindpur of the Sadar subdivision and Topchanchi, Baghmara, Katras, Chas and Chandankeari of Baghmara subdivision of the district. The distress was acute in the entire non-industrial areas of the district which continued till the end of November, 1958.

At the initial stage, emergency irrigation measures were undertaken by launching a special drive and approachable paddy fields were irrigated by different types of pumping sets from available sources of water.

Hard Manual Labour Schemes were undertaken by digging *kacha* wells, desilting of wells and tanks, construction of *kacha* roads, embankments, *nallahs* to provide employment to the people affected. The schemes continued till November, 1958.

Three *charkha* centres under the Bihar State Khadi Board were started during the year 1958-59 to employ persons. A total quantity of 722 maunds and 20 seers of wheat were distributed to trainees at these centres and a sum of Rs. 751.74 nP. was given in cash.

Public health was satisfactory. Medical and public health arrangements were taken in hand and the incidence of mortality was checked.

In the years 1957-58 to 1958-59 during the scarcity period the total area and population affected were 930 square miles and 514,795 souls respectively. Relief measures were taken during these years. A sum of Rs. 16,600 was distributed towards relief works in shape of construction of roads and houses, etc., and Rs. 3,18,500 as gratuitous relief. Besides, the sums of Rs. 2,85,000 and Rs. 6,41,500 were distributed as agricultural loan and Rs. 61,000 and Rs. 55,000 towards Land Improvement Loans during the years 1957-58 and 1958-59 respectively.

CHAPTER V.

INDUSTRIES.

INTRODUCTION.

Dhanbad is the most highly industrialised district in the State of Bihar. The dominant industry of the district is coal mining and it is coal which has attracted and brought about a concentration of numerous other industries within its limits. The metallurgical coal of the Jharia Coalfield within the district which feeds the existing steel plants and has enabled the country to launch upon an ambitious scheme of iron and steel production has given Dhanbad a very important and prominent place in the industrial programme of the nation. There are five coke plants located in this district. They are fed mainly by the metallurgical coal produced in the Jharia Coalfield of Dhanbad. The rich variety of coal by-products from these coke plants has provided the basis of a high chemical industry in the country. Due to its supreme importance, the subject of coal has been dealt with separately and in some details in this chapter and also elsewhere.

Next in importance among the industries in this district is the Fertilisers and Chemical Industry at Sindri and the Bihar Government's Superphosphate Factory there. The production capacity of the Sindri Fertiliser and Chemical Factory is one thousand tons of ammonium sulphate per day. The factory is under expansion and will be producing an additional quantity of 250 tons of ammonium sulphate, 70 tons of urea salt and 150 tons of ammonium nitrate. The ammonium sulphate and ammonium nitrate thus produced will be sold as a mixed fertiliser whereas urea will be sold as it is. The Sindri Fertiliser and Chemical Industry has brought about at Sindri the existence of two other undertakings, a cement factory and a coke plant.

There is one lead and silver refining and smelting industry in the district, the only one of its kind in India, run by the Metal Corporation of India, Ltd., at Tundoo. It is producing lead and silver from the ores received from the Zawar mines in Rajasthan and other raw materials from different places.

One other major industry in the district is the Refractory and Ceramic Industry. The various large concerns engaged in this industry within the district are the Kumarjhubi Fireclay and Silica Works, the Reliance Firebricks and Pottery Co., at Chanch, the Bihar Firebricks and Potteries, Ltd., at Mugma, the Gufabari Fire Clay and Silica Works, the Bengal-Bihar Firebricks and Pottery Works, the Nirsa Refractory, the Jharia Firebricks and Pottery Works, etc. A very big industry has grown up and is being further developed to meet the increasing demands of the country in refractories, ceramics, firebricks, potteries, etc.

There is a Radio Manufacturing Factory, namely, the Hindustan General Electric Corporation, situated at Karanpura, Nirsā within the district, producing radio sets, electric switches, etc. The Khandelwal Glass Works at Chota Ambona is the only glass factory in the district producing different kinds of glass wares.

To serve the requirements of and with the impetus given by the coal industry, quite a number of engineering concerns and workshops have been established in the district and are in a flourishing condition. Some of them are the Kumardhubi Engineering Works, the Eagle Rolling Mills, the Meamco, Shri Ram Krishna Engineering Co., and various other units mainly engaged in the manufacture of different parts and equipments required in the collieries.

Apart from these heavy, medium and small industries, there are quite a number of small-scale units scattered all over the district. In Chas, there are a number of shellac factories, in Chandankhari, quite a large number of weavers have been carrying on their trade from generation to generation. In Tundi and Gobindpur, there are rearers of silk yarn and a number of potters, carpenters and blacksmiths engaged in their family trades. Besides these, there are a number of small *bidi* manufacturing units, scattered in different parts of the district. From the State Government of Bihar, financial and technical help is given to these small local industries and efforts are being made to improve their working techniques and economic conditions.

COAL INDUSTRY.

Among the States in India, Bihar is the largest single producer of coal with West Bengal a distant second and Madhya Pradesh a very distant third. In 1956, out of a total output of 39.28 million tons of coal in India, Bihar produced 20.08 million tons representing 51.1 per cent and valued at Rs. 31,65,25,491. Next came West Bengal with an output of 11.27 million tons representing 28.7 per cent of the total valued at Rs. 18,86,65,031.

Most of this coal produced in Bihar comes from the Jharia Coalfield in the district of Dhanbad which contains the largest coal deposits and is the most developed single coalfield within the country. The newly formed district of Dhanbad, on separation from the predominantly agricultural Sadar subdivision of Manbhum, has truly become the coal district in Bihar. As a result of reorganisation of the States, the two revenue *thanas* of Chas and Chandankhari with their coal-bearing areas on the north side of river Damodar have been transferred from the Sadar subdivision of Manbhum to this new district of Dhanbad which, therefore, contains today practically the entire coal-bearing areas of the former

district of Manbhum except the small coal area with a few colliery units on the border line of West Bengal which remains included in the new district of Purulia now incorporated in West Bengal. There are six collieries in the said area which has gone over to West Bengal, namely, Deoli, Hirakhun, Parbelia, Ranipur, Saltore and Moutha whose total output in 1956 was 4,92,907 tons and labour strength 4,886 persons.

The famous Jharia Coalfield in the district is the richest treasure-house of India's metallurgical coal which has brought Dhanbad prominently on the industrial map of the world. In the task of rapid industrialisation of the country with particular emphasis on the development of basic and heavy industries, one of the principal objectives of the Five-Year Plans, the metallurgical coal of this district has been playing and is destined to play in future a vital role not only as a source of fuel, energy and chemicals but also as the sole supplier of the raw material for manufacture of hard coke for the steel works and other consumers. The availability of Jharia's superior-quality metallurgical coal has made it possible for the country to launch upon an ambitious scheme of steel manufacture by starting new iron and steel works,—one each at Rourkela, Bhilai and Durgapur and later on one at Bokaro also—and by expanding the two existing steel works of TISCO and IISCO at Jamshedpur and Bumpur respectively to almost double their present capacity. There will be more steel works under the Third and subsequent Five-Year Plans—all depending mostly upon the reserve of metallurgical coal in the district of Dhanbad.

The high grade metallurgical coal of the district is utilised for manufacture of hard coke not only in the coke plants of the various steel works for use in their blast furnaces but also in several unattached coke plants which meet the requirements of various engineering works and other special consumers of hard coke. There are five such coke plants in the district of Dhanbad,—one each at Loyabad, Bararee, Bhowra, Lodna and Sindri. Outside the district, there is one old coke plant at Giridih in the district of Hazaribagh and another new coke plant has been constructed at Durgapur in the Burdwan district in West Bengal. Most of these coke plants produce coal by-products which have laid the foundations of a big chemical industry in the country.

The inferior and medium grade coking coals of the district, both in the Jharia and the Mugma Coalfields, are pre-eminently suitable for manufacture of soft coke and in fact the entire soft coke at present being manufactured in the country is the product of the lower seams of coal of this district of Dhanbad. The expanded use of soft coke throughout the country, particularly in the countryside, has become imperative in view of the urgent

necessity of conserving cattle dung and forest products, so extensively used for domestic fuel purposes, for the benefit of agricultural lands as natural manures and fertilisers. For replacement of cattle dung and forest products by soft coke as a domestic fuel in increasing quantities, the manufacture of soft coke will have to be stepped up rapidly during the coming years. As the only raw material for this manufacture of soft coke, the lower grade coking coals of the district are thus called upon to play another important role in the interest of the country's agriculture even as the higher grade coking coals of the district are providing the basis of the country's steel and other heavy industries.

The rich deposit of coal in the district with its immense potentialities in so many directions has attracted to this coalfield a number of industries and it is due to this concentration of so many industries within the Jharia Coalfield that it has come to be regarded as the Ruhr of India. The coalfield of Jharia was selected in preference to the gypsum field of Rajasthan for location of the great Fertiliser and Chemical Industry at Sindri which is the biggest Fertiliser and Chemical Factory in Asia and which has also brought into existence a modern coke plant and a cement factory close to it within the limits of Sindri. Other industries which have grown up round about the coalfields of the district of Dhanbad are a large size ceramic industry, pottery works, lead and zinc smelting industry, a superphosphate industry and numerous other mills, factories, workshops and engineering establishments. Due to its coal wealth, Dhanbad is thus the most industrialised district in the State of Bihar.

The Gondwana formations in the Jharia Coalfield, according to the Geological Survey of India cover an area of approximately 175 sq. miles as follows:—

(a) Barakar coal measures	..	..	85 sq. miles.
(b) Middle (Barren) measures	..	..	69 „ „
(c) Ranigunj coal measures	..	..	21 „ „
Total			175 „ „

The available *in situ* reserves of all types of coal in the Barakar measures of the Jharia Coalfield up to a depth of 2,000 feet according to most recent estimates are of the order of 11,727 million tons. In addition, some 180 million tons reserves of coal indicated to be Selected B and Grade I according to Coal Commissioner's classification exist in the Ranigunj measure of the coalfield as estimated by the Committee of Conservation of Metallurgical Coal, 1949. Large additional reserves in the Barakar measures exist at depths greater than 2,000 feet, but no estimates of these are available at present.

The detailed estimates of coking coals in the Jharia field made by the said Metallurgical Coal Conservation Committee, 1949 are as follows:—

A. In the working areas—

Selected grades—865.9 million tons.

Grades I and II—680.6 million tons.

B. In the Virgin areas—

Selected grades—325.6 million tons.

Grades I and II—88.5 million tons.

Total	1,960.6 million tons.
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The deposits of Grades III A and III B and of non-coking coals were excluded by the Committee from the above estimates.

According to the report of the Chief Inspector of Mines in India for the year 1956, the number of working mines in the then district of Manbhum were 447 of which 215 were worked mechanically and 232 manually. With the transfer of the six collieries as stated above to the district of Purulia in West Bengal, the number of working collieries in the district of Dhanbad are 441 only. The total number of collieries in India are 843 and the number in Bihar (excluding the said six collieries) are 527. The district of Dhanbad, therefore, contains 52.3 per cent of the total number of mines in India and 83.6 per cent of the total number of mines in Bihar.

In 1956 out of a total all-India coal output of 39.28 million tons and Bihar's total output of 20.08 million tons, the total output in the then district of Manbhum was 15.34 million tons. Deducting the output during the year of the six collieries transferred to West Bengal, i.e., 0.49 million tons, the total output in Bihar was 19.59 million tons and in the district of Dhanbad 14.85 million tons. The output of the Dhanbad district, therefore, represented 37.5 per cent of the all-India output and 75.3 per cent of the total output in Bihar.

The average daily number of workers employed in 1956 in all the collieries in India was 3,52,429 and in all the collieries in Bihar was 1,82,194 persons. The total number employed in the collieries in Manbhum was 1,38,212 persons. Deducting 4,886 persons working in the six collieries transferred to West Bengal, the total number of workers employed in the collieries in the district of Dhanbad may

be taken at 1,33,326 persons representing about 37.8 per cent of the all-India number and about 75.2 per cent of the all Bihar number. In 1956, the average weekly earnings of mine workers in the district ranged between Rs. 10-6-4 earned by a surface woman worker and Rs. 17-5-10 earned by the underground workers. Besides these cash earnings in basic wages, there are other payments and concessions. The average number of hours worked by a worker in the mines is 48 hours per week.

Out of the total soft coke amounting to 1.60 million tons made in India, the soft coke made in the collieries in Dhanbad district comes to about 1.46 million tons representing 91.3 per cent of the total all-India figure. Soft coke is, therefore, the special contribution of the district of Dhanbad from its two fields—the Jharia Coalfield and the Mugma Coalfield. It is proposed to increase the output of soft coke to 3 to 4 million tons in the next few years and the district of Dhanbad is destined to play the major role in the production of this large quantity. The ultimate target is, however, an overall production of 15 to 20 million tons of soft coke and in view of the abundant deposits of lower grade coking coals of this district, pre-eminently suited for manufacture of soft coke, the soft coke manufacturing industry of this district will assume great importance and immensely benefit India's agriculture by assisting conservation of cattle dung and forest products to be utilised for manuring purposes.

Manufacture of hard coke in coke plants with or without extraction of coal by-products is another major industry of the district which has assumed considerable importance today due to expansion of the steel works and other heavy basic industries. There are nine coke plants in India of which three are attached to the steel plants. As already stated, there are five coke plants in Dhanbad district and at Loyabad, Bararee, Bhowrah, Lodna and Sindri. The production of coke in coke plants was 2.42 million tons in 1956 of which those attached to the steel plants produced 1.90 million tons and the unattached plants produced 0.52 million tons in the district of Dhanbad. The by-products made in these coke plants during 1956 were tar 24,991 tons, pitch 859 tons, sulphate of ammonia 1,744 tons, sulphate acid 4,074 tons, soda sulphate 22 tons, naphtha (solvent, light and heavy) 21,898 gallons, naphthalene 84,725 lbs., benzene 1,27,399 gallons, benzol 2,30,445 gallons, barcolene 7,397 gallons, toluenes 12,361 gallons, tar acid 425 gallons, solven oil 10,187 gallons, creosote oil 57,516 gallons, heavy anthracene 40,839 gallons, creosote, heavy and light 45,533 gallons and middle oil 22,592 gallons. These by-products were mostly made by the coke plants in the district of Dhanbad. The Shalimar Tar Products (1935), Ltd., situated at Lodna Colliery area produces road and other kinds of tar, pitch, creosote oils, refined naphthalene, disinfectants, etc., its total monthly capacity being 4.160 tons.

TABLE

Statistics of

Number of persons employed in and above

District.	Name of coalfield.	Years.	Number of mines.				
			Under the scope of the Act.	Opened during the year.	Closed during the year.	Worked with mechanical power.	Worked without mechanical power.
1	2	3	4	5	6	7	8
Dhanbad	Jharin	1956	368	2	3	189	179
		1957	363	4	4	254	109
		1958	369	..	1	244	125
		1959	363	4	1	256	107
		1960	347	..	1	276	71

SOURCE.—Annual Reports of Chief Inspector of

TABLE

Statistics of

Number of persons employed in and above

District.	Name of coalfield.	Years.	Males.	
			Open cast workings.	Workers in any attached factory.
1	2	3	4	5
Dhanbad	.. Jharin ..	1957	7,070	2,359
		1958	8,509	2,739
		1959	9,133	2,094
		1960	11,550	2,133

SOURCE.—Annual Reports of Chief Inspector of

1.

Mines (Dhanbad).

the mines subject to the Mines Act, 1952.

Labour.			Daily average number of persons employed during the year.					
Direct.	Contract.	Total.	Below ground.			Open cast workings.		
			Overmen and Sirdars.	Miners and loaders.	Others.	Overmen and Sirdars.	Miners and loaders.	Others.
9	10	11	12	13	14	15	16	17
Not available			2,126	21,554	23,317	222	2,941	2,839
1,16,671	10,492	1,27,163	2,163	43,942	24,317	256	3,421	3,393
1,16,222	12,450	1,28,672	2,218	44,722	25,050	282	4,263	3,964
1,15,530	12,152	1,27,682	2,182	43,643	25,081	316	4,802	4,015
1,13,690	14,341	1,28,031	2,226	43,409	25,264	345	5,653	5,552

Mines, Government of India at Dhanbad.

2.

Mines (Dhanbad).

the mines subject to the Mines Act, 1952.

Males—concl'd.			Females.		
Others.	Above ground.	Total males.	Open cast workings.	Above ground.	Total females.
6	7	8	9	10	11
24,567	31,933	1,09,930	3,716	13,393	17,144
24,470	31,904	1,12,493	4,118	12,078	16,185
24,002	31,063	1,11,102	4,512	12,038	16,580
22,671	29,554	1,11,093	5,253	10,785	16,038

Mines, Government of India at Dhanbad.

TABLE
Statement showing the raisings,

District.	Name of coalfield.	Years.	Opening stocks (in tons).	Raising (in tons).	Value (in rupees).
1	2	3	4	5	6
Dhanbad ..	.. Jharin ..	1955 ..	10,95,223	1,32,70,838	17,86,45,697
		1956 ..	20,50,800	1,38,21,900	21,57,99,369
		1957 ..	Not available.	Not available.	Not available.
		1958 ..	19,99,346	1,47,89,290	26,71,00,264
		1959 ..	15,28,640	1,47,56,067	27,31,24,010
		1960 ..	13,41,352	1,58,49,994	37,61,28,607

SOURCE.—Annual Reports of Chief Inspector of

3.

despatches and stocks of coal (Dhanbad).

Total of Cols. 4 and 5 (in tons).	Despatch (in tons).	Colliery consumption (in tons).	Coal delivered for cooking at colliery (in tons).	Shortage due to fire, rains and other causes (in tons).	Closing stock (in tons).	Coal despatch to coke factories (in tons).
7	8	9	10	11	12	13
1,52,66,061	1,00,20,764	7,96,161	23,76,062	20,64,074	1,52,66,061	12,52,127
1,58,72,709	1,08,93,176	7,77,767	23,49,404	18,52,312	1,58,72,709	13,31,249
Not available.	Not available.	Not available.	Not available.	Not available.	Not available.	Not available.
1,67,88,036	1,18,90,365	7,66,562	25,91,361	93,343	14,47,011	5,09,141
1,62,84,707	1,16,43,309	7,30,020	25,39,281	48,095	13,23,102	5,23,730
1,71,91,346	1,22,69,728	7,50,747	23,19,856	95,145	17,49,870	2,06,118

Mines, Government of India at Dhanbad.

SINDRI FERTILISER AND CHEMICAL INDUSTRY.

Of the coal-based industries which have been established in the district, the Sindri Fertiliser Factory is the biggest one. It also represents a unique national achievement. The first industrial project completed by India after independence was achieved, it is the largest fertiliser factory in Asia and one of the most modern and major fertiliser producing units in the world. It is the nucleus of a heavy chemical industry which will eventually lead to further industrialisation. Already it has given rise to a number of allied industries such as those manufacturing coke and cement and important industrial by-products like benzol, benzene, toluene, naphthalene and coal-tar.

The idea of starting a Fertiliser Factory at Sindri can be traced to the troubled years of the war and to the grim tragedy of the disastrous Bengal famine of 1943 which involved the death of three million people of starvation and brought home to the Government of India the urgency of undertaking long-term measures to increase food production in the country. The question was examined by the Foodgrains Policy Committee and other bodies and it was found that a high level of fertiliser consumption was essential for high crop yields. The Committee estimated that India would require between two and three million tons of artificial fertilisers and it recommended that as the first step a factory with a production capacity of about 3½ lakh tons of ammonium sulphate annually should be set up as early as possible. Accepting the recommendations the Government carried out a survey of the necessary raw materials, particularly coal and coke as fuel, gypsum and power supply and held consultations with an expert British Technical Mission invited to advise the Government on the point.

The Mission recommended that one large factory should be set up whether at Harduaganj near Aligarh or at Sindri in Bihar for production of 3,50,000 tons of ammonium sulphate per annum by the gypsum process. There was some controversy about the location of the fertiliser factory but the final choice fell on Sindri because of its nearness to two of the three principal raw materials required for the operation of the factory, namely coal and coke and because it was comparatively advantageous to bring gypsum, the third raw material, from Jodhpur and Bikaner in empty coal wagons returning to the coalfields.

The construction of the factory which started in 1947 with the combined technical skill of engineers from three countries, India, the U. K. and the United States and involved tremendous problems of importing giant plants from abroad, their transport from port to the factory site by special roads and their installation was completed in 1951 after years of intensive activity and hard labour. The factory was inaugurated on the auspicious *Diwali* day in October, 1951 and

produced 7,445 tons of ammonium sulphate in the two remaining months of the year. The production in 1952-53 was 2,19,340 tons which rose progressively from year to year and reached the level of 3,33,70 tons in 1956-57.

The Sindri Factory spreads over nearly $1\frac{1}{2}$ square miles and has more than 7,000 workers on its rolls. It has 80 miles of pipe lines, 170 miles of electric power cables, 7 miles of belt conveyors, 12 miles of telephone lines, 18 miles of tarred roads and 12 miles of railway tract in the factory and the marshalling yard. The factory consumes about 1,700 tons of coal, 600 tons of coke, 1,800 tons of gypsum and about 400 tons of other raw materials per day. The outturn amounts to about 1,000 tons of ammonium sulphate, 33 million cubic feet of gas, 270 tons of anhydrous ammonia, 900 tons of chalk and 300 tons of ash per day. The figures place Sindri among the biggest industrial enterprises in the country.

There are five main groups of plants in the production of ammonium sulphate at Sindri: (1) the Power Plant, (2) the Gas Plant, (3) the Ammonia Plant, (4) the Sulphate Plant and (5) the Coke Oven Plant. The Power House has an installed capacity of 80,000 Kw. The Coke Plant constructed by the German firm, Messrs. Carl Steel in 1954 reached its full rated capacity of 600 tons per day within two months of its inauguration. The plant built at a cost of Rs. 2.8 crores utilises coal of low quality and thus saves high grade coal for our expanding steel industry.

With a view to utilise the many by-products released by the Sindri Factory, several allied industries have grown up. The Associated Cement Company has started a cement factory at Sindri at a cost of about Rs. 2 crores which uses about 900 tons of calcium carbonate (sludge) at present producing 600 tons of cement per day. The production capacity of the cement factory will be increased further to about 900 tons per day to utilize all the chalk accruing from the expanded plants of the Sindri Fertiliser Factory. The benzol plant in the factory which went into production in May, 1955 has the capacity to produce 300 gallons of motor benzol, 700 gallons of pure benzene, 20 gallons of pure xylene, 40 gallons of solvent naphthalene and 32 tons of tar per day. According to present plans, Sindri will set in an almost unending chain of allied industries.

Sindri is also going to make use of the surplus coke oven gas for production of 70 tons of urea and 400 tons of ammonium sulphate-nitrate per day. Both these fertilisers are suitable for our crops and soils. They have been successfully used in Europe, America and Japan. The cost of the plant is Rs. 7 crores in addition to the sum of Rs. 4 crores to be spent on consequential internal expansion of the factory.

Until January 15, 1952 the Sindri Factory worked under the direct supervision of the Union Ministry of Works, Mines and Power. On December 18, 1951, the Sindri Factory was registered as

a private limited company with the Registrar of Joint Stock Companies, Bihar, under the name of Sindri Fertilisers and Chemicals Private, Limited. The company started functioning from January 15, 1952. It has an authorised capital of Rs. 30 crores in addition to which a loan of Rs. 6 crores in the form of debentures has been advanced by the Government of India. Repayments have been made on this account. All the shares of the Company are held by the Government of India. The factory is managed by a Board of Directors nominated by the President of India with a full-time Managing Director.

With an enlightened labour policy, the Sindri Factory has been aiming at setting a pattern in enlightened management. A spirit of disciplined service inspires the workers who are well paid, well treated and well looked after. As a result the production of the factory has been going up and its production cost showing a progressive decline.

SUPERPHOSPHATE FACTORY.

The Bihar Government Superphosphate Factory is located on Dhanbad-Sindri Road near Chasnalla about 16 miles from Dhanbad.

The production capacity of the factory is 25 tons of sulphuric acid and 50 tons superphosphate per day.

The value of superphosphate produced per annum is about Rs. 33,00,000 and the value of raw materials imported is about Rs. 20,00,000. The factory has been provided with independent water-supply from Damodar river. Electricity is being supplied by the Bihar Electricity Corporation at 11 Kv. and is stepped down to 400 volts for distribution inside the factory.

The factory is capable of expansion to about 60,000 tons superphosphate per annum, as the demand increases, by installing additional equipments. Expansion in the various sections has been taken up. The factory has also plans to manufacture mixed fertilisers to supply the nitrogen and phosphorus required for a healthy plant growth.

CEMENT INDUSTRY.

The Sindri Cement Works of the Associated Cement Companies, Ltd., situated at Sindri within the district, is the latest addition to the network of A.C.C. Factories and is unique in many ways. It went into production in September, 1956. It does not have the conventional limestone quarries. The principal raw material is the calcium carbonate sludge which is a waste product of the Sindri Fertiliser Factory. This is said to be the second cement factory of its kind in the world and first in Asia, using the type of raw material for manufacture of cement.

The A. C. C.'s Sindri Cement Factory was initially designed to produce 2,00,000 tons of Portland cement per annum, which was related to the capacity of the Fertiliser Factory to produce ammonium sulphate. With the expansion of the Sindri Fertiliser, producing

more of sludge, the A.C.C.'s Sindri works embarked on expanding its plant capacity to produce 900 tons of cement per day. There is expectation of further extension of the factory.

As stated under refractories section, refractory fireclays and cement for all purposes are also manufactured at the refractory factories at Kumardhubi and other places in the district.

ROLLING MILLS.

Eagle Rolling Mills, Ltd., at Kumardhubi established in 1927 is a re-rolling mill comprising of one 18" breakdown mill and one 12" finishing mill. The mill was driven by steam engine at first which was later replaced with electric drive. It rolls from billets received from either Indian Iron and Steel Company, Burnpur Works or Tatas' Jamshedpur Works or from imported sources according to the planning of Iron and Steel Control.

Its sections vary from $\frac{3}{8}$ " to 2" Rds., $\frac{1}{2}$ " to 2" sqrs., $\frac{3}{4}$ " \times $\frac{1}{4}$ " to 2" flts and $1\frac{1}{4}$ " \times $1\frac{1}{4}$ " \times $\frac{1}{4}$ " to 2" \times 2" \times $\frac{1}{4}$ " angles. The mills' output was approximately 24,000 tons in 1961-62 and its labour strength was about 500.

REFRACTORIES INDUSTRY.

The industry came to be started in Bihar in the last part of the 19th century and practically all its important units are located in the district of Dhanbad. A small works at Gollarbary near Mugma within the district of Dhanbad is the oldest unit in Bihar. In the early part of the 20th century in 1907, Messrs. Kumardhubi Fireclay & Silica Works, Ltd. (of Messrs. Bird & Co.) commenced the manufacture of firebricks on a very modest scale in order to fulfil the demands created by the small engineering works and foundries established by that time in the country.

The establishment of a large steel industry at Jamshedpur in the first decade of the century gave an impetus to the Refractories Industry and a number of other works gradually came into existence. For many years, however, and until the late thirties the firebricks trade was in doldrums, the demand being negligible. During the war years, the demand of refractories, specially of firebricks increased considerably and today apart from the Kumardhubi Works, several other factories which came into existence are meeting those demands. Mention may be made here of the Reliance Firebricks & Potteries, Ltd., Behar Firebricks & Potteries, Ltd., Mugma, Bharat Refractories, Jharia, Jharia Firebricks & Potteries, Ltd., at Dhansar and Bengal-Bihar Firebricks Company, Mugma, and Jawahar Firebricks, Mugma.

Messrs. Bird and Co.'s range of refractories made in the Kumardhubi factory is now very well known in India. Their products have been modified and expanded and comprise a full range of moderate heat, high heat and special heat duty fireclay refractories together

with silica bricks, insulation bricks, fireclay and cement for all purposes. Situated at Kumardhubi on the Grand Trunk Road and Eastern Railway, the factory is most advantageously located with respect to transportation of raw materials and finished products. It has all kinds of most up-to-date high quality plants for production of refractories of different descriptions. Refractory fireclay and cement for all purposes are also manufactured by this company which have achieved wide popularity over the course of years.

The Silica Brick Works of the Company, Messrs. Kumardhubi Fireclay & Silica Works, Ltd., is the largest and oldest established in India. Extensive tests by the leading refractories testing establishments in Europe have proved that the company's silica bricks are equal to the high grade silica products of any country and they supply extensively to the iron and steel, gas and glass makers in the country as also to the Ordnance Factories and many other industrial concerns. After remodelling their Firebrick section with the installation of a tunnel kiln, the first of its kind in India, and a rotary kiln to handle the calcination of raw materials, the company increased their firebrick output from 1,550 tons in 1939 to 3,350 tons in 1955. A scheme for doubling this output of the Firebrick Department was completed in 1957, the extended plant being thoroughly mechanised with the most modern machineries and two tunnel kilns. The company which produced the first silical brick in the country in 1916 has at present (1962) an output of this quality of brick approximately 87,000 tons. The company employs 3,300 workers.

The Harry Refractory & Ceramic Works is situated at Kallobathan, Nirshachatti in the district of Dhanbad. It was registered under the Factories Act on 1st July, 1957. It manufactures refractories and refractory articles such as firebricks of all shapes, descriptions and specifications, fire-clay powder and other allied refractory materials to meet the requirements of steel plants, glass works, cement factories, paper mills, etc. Output per month is six wagons of standard 3" firebricks at present and expansion has been taken in hand to make it a full-fledged firebrick-making plant. Its output is 4,000 tons per annum and employs about 400 workers.

The Behar Firebricks & Potteries, Limited at Mugna was established in 1919 and is now managed by a Board of Directors at Calcutta who took over from the original Managing Agents, M/s. A. C. Banerjee & Company. The authorised capital of the company is Rs. 20 lacs. The factory went through substantial expansion and now its total installed capacity is 50,000 tons, insulation bricks 200 tons, silica refractories 13,200 tons and fire-cement 6,000 tons per annum. Its labour strength is near about 1,200.

These factories are not only located in the district of Dhanbad but most of their raw materials and coal are also drawn from the district. The total production of refractories in Bihar (all situated in this district) is today about 5,00,000 tons and about 75 per cent

of this is utilised by the steel industry and the balance by other industries, such as, sugar, cement, glass, railways, ordnance factories, etc. It is because of the availability of coal and most of the raw materials that the refractory industry has grown up in the proximity of the coalfields of this district.

LEAD SMELTING AND REFINING INDUSTRY AT TUNDOO.

Till recently it was hardly known to the industrial world that a most promising industry founded about 16 years ago in a village near Katrasgarh, district Dhanbad had emerged to occupy a position of pride as the pioneer and only producer of virgin lead and fine silvering in purity with international specification.

In 1942, a deposit of lead ore in a village was taken on lease by the Eastern Smelting and Refining Company, Limited and the present smelter at Tundoo near Katrasgarh in Dhanbad was simultaneously installed on a pilot scale. A few hundred tons of lead were smelted in the following 3 to 4 years which marked the beginning of lead mining and smelting industry in India on a commercial scale.

The present source of lead and silver is the company's mines at Zawar in Rajasthan about 30 miles from Udaipur. A prospecting license was granted by the State in 1945 to Messrs. Metal Corporation of India, Limited promoted by the Eastern Smelting and Refining Company, Limited as Managing Agents. A lease of the Zawar mines was granted to the company in 1950.

The lead concentrates from the above mines is mixed with different fluxing materials and undergoes different operating processes of bedding, sintering, smelting and refining. The final product is refined lead which is marketable and assays 99.995 plus. Silver in the form of crusts is separated in lead refining operation and is subjected to the operations of liquation, retorting and cupellation. Refined silver produced in the smelter is marketable and assays 996 plus. fine.

About 90 per cent of refined lead is shipped to Calcutta and the remainder to places all over India. Refined lead is used in the manufacture of pigments, storage batteries, pipes, sheets, alloys and other ancillary products. Fine silver is despatched to Calcutta and sold to the bullion markets through selling agents.

Refined lead production at Tundoo was 76.0 tons in 1944-45 which progressively rose to 2,143.0 tons in 1955-56 and to 3,470.0 tons in 1956-57. Zinc concentrates at present are being shipped to Japan for treatment and the metal is being returned to India for home consumption. Minute quantity of gold to the extent of 5 oz. per ton of silver bullion is present. In the near future when production is greatly increased, attempts to concentrate the gold in silver

bullion will be made. Progress at the corporation's mines at Zawar has reached its second development state with prospects to raise the level of its run-of-mine ore production to 500 tons daily.

The outlook for lead and zinc industries in India has very bright prospects and is of national importance to the country, which is very short of these important non-ferrous metals. The district of Dhanbad has reasons to be proud that it has harboured and nourished to pioneer the only producer company near its coal-field at Tundoo in respect of virgin lead and fine silver of a quality comparable in purity to foreign products and meeting with international specifications.

The main raw materials, lead concentrate, is received by the Company, the Metal Corporation of India, Limited, in the smelter from its mines packed in gunny bags and averages 72–75 per cent lead and 20–30 oz./ton of silver. Metallurgical hard coke is received from local sources in Dhanbad. Limestone and iron ore are obtained from Maihar in U.P. and Bara Janda in Orissa respectively. Sand and quartzite materials are available locally. Furnace oil is supplied by Burmah Shell Company, Calcutta from their Budge-Budge Depot.

The company employs about 500 men including supervisory staff and labourers. The company handles about 70 wagons in a month both inwards and outwards and has its own truck and other road transport arrangements.

RADIO AND ELECTRIC GOODS.

The Hindustan General Electric Corporation, Limited, popularly known as H.G.E.C. is the first full-fledged radio receiver manufacturing factory constructed on a plot of land measuring 500 *bighas* on the Grand Chord Line between Mugma and Kalubathan Railway stations within the district of Dhanbad. H.G.E.C. is also the trade mark of the company.

With a manufacturing capacity of about 200 radio sets per day, the factory has a total labour force of about 500 persons. A large number of component parts for the radio sets are made at the factory and its dependence on imports is confined only to a few items. This dependence is gradually being removed by manufacture of more component parts. The H.G.E.C. Factory is equipped with 1,000 ton Bakelite Press to make cabinets for the radio sets. It is also well-equipped for the production of electrical accessories.

The H.G.E.C. radios are made in this factory in technical collaboration with Messrs. Saba of West Germany, a firm of great repute. A number of German Engineers work in the factory and the company has also a number of trained Radio Engineers in its Company, Limited, Oldbury, Birmingham, pioneers in the British

Electrical Industry has enabled the company to arrange for manufacture of a wide range of Simplex-H.G.E.C. products such as ironclad switch and fuse proof equipments and lundburg accessories, etc.

Among the small and medium sized industries, mention may be made of (1) grinding and breaking of cereals of which there are about 125 establishments providing employment to about 250 workers; (2) Sri Ram Krishna Rice and Oil Mills, Limited in Dhanbad town with milling capacity to produce nearly 100 maunds of oil per day and providing to about 100 workers; (3) ice and ice cream factories—those worth mentioning being the Prag Ice Factory and Jharia Ice and Cold Storage, both in Jharia, Shree Pure Ice Factory at Katrasgarh and Jai Ice Factory at Dhanbad with total capacity of nearly 80 maunds per day during summer season; (4) paper printing presses about 18 in number of which those employing more than 10 workers number 8 and (5) timber sawing—nearly 12 establishments employing a total of about 250 workers. These illustrate the variety of industries of this district. Even then, the district is not yet fully developed and it will take sometime to develop the rich and almost unlimited potential of this growing district.

ENGINEERING WORKS, KUMARDHUBI.

It was established in 1917 in Kumardhubi. This industry is managed by Bird and Company. It employs about 2,850 workers. It has been started to repair electric drills, coal-cutting machines, haulages, pumps and steam plants, etc. The industry undertakes fabrication works also like, headgears, steel trusses, transmission posts and other steel structures like mixing cones, ventilation fitting, etc. Manufacture of coal tubs is also made.

Steel scrap and sand are the main raw materials. The raw materials are procured from Railway workshop, viz., Chittaranjan and Jamalpur, etc., from open market and Tata Iron and Steel Company and Indian Iron and Steel Company, Bumpur. Sand comes from Damodar river and also from Rajmahal in Santhal Parganas district.

The statement below will give an idea of approximate output in tons during 1957-58 to 1961-62:—

1957-58	..	..	..	7,954 tons.
1958-59	..	..	..	8,268 tons.
1959-60	..	..	..	8,028 tons.
1960-61	..	..	..	8,381 tons.
1961-62	..	..	..	9,294 tons.

M McNALLY BIRD ENGINEERING COMPANY, LTD., KUMARDHUBI.

McNally Bird Engineering Company, Ltd., was formed in 1962 at Kumardhubi. It was registered on the 10th July, 1961 in Calcutta. About 60 per cent of the shares are met by the American counterparts and the rest 40 per cent by Bird and Company. The

factory is in final construction stages. The higher technical staff have taken up the work of setting up plants and machineries. Recruitment of supervisory and subordinate staff is going on. It is expected that the concern will go into production in 1964-65.

The Board of Directors who have got their offices in the Chartered Bank Buildings at Calcutta, the registered office of the company, are final authorities regarding the operation of the company.

There are three American experts with this company as Chief Technical Adviser, Engineering Adviser and Operations Adviser respectively with a view to train the Indian personnel in the specialised line of manufacture of coal washery equipments.

The main items of raw material for this industry are rolled steel plate and sections for which they have to depend on the Iron and Steel Controller for quotas and other rules and regulations made by the Government.

The factory has been licensed for the manufacture of coal preparation plants machinery, coal and bulk material handling systems and miscellaneous heavy machinery.

The total strength of labourers working in this factory is now only about 150. This number will go up considerably when the factory goes into production. Mostly labour is now (March, 1963) recruited on the factory gate who report for employment. The minimum wages per day for a worker in the factory is Rs. 2.50 nP.

The Government of Bihar has made 575 houses under its subsidised Industrial Housing Scheme at Kumardhubi and about 150 tenements for the employees of this factory has been reserved. About 25 houses have been occupied by now.

SOURCES OF POWER.

The district of Dhanbad is receiving power from Damodar Valley Corporation. There is a Thermal Station at Loyabad but it is a private one. The other coalfields of the district have their own power supply. The Bihar State Electricity Board is purchasing power from Damodar Valley Corporation and Loyabad Power House. The following statement supplied by Electricity Board Department, Dhanbad, will show the units purchased and sold for the period of 1959-60, 1960-61 and 1961-62:—

TABLE I.

Months.	Units purchased.	Units sold.
1. April, 1959 ..	34,03,344	28,65,007
2. May, 1959 ..	33,49,363	29,59,729
3. June, 1959 ..	31,61,123	2,84,767
4. July, 1959 ..	37,89,760	30,53,646

Months.	Units purchased.	Units sold.
5. August, 1959 ..	47,05,933	36,38,631
6. September, 1959 ..	49,43,854	43,39,644
7. October, 1959 ..	50,24,777	44,13,905
8. November, 1959 ..	46,16,487	40,67,620
9. December, 1959 ..	46,08,060	40,83,271
10. January, 1960 ..	44,79,953	39,99,664
11. February, 1960 ..	41,47,840	37,35,288
12. March, 1960 ..	41,92,330	39,05,482
13. April, 1960 ..	39,73,696	25,16,801
14. May, 1960 ..	41,76,864	35,65,986
15. June, 1960 ..	41,90,517	36,43,997
16. July, 1960 ..	46,50,423	40,26,201
17. August, 1960 ..	54,11,870	51,82,077
18. September, 1960 ..	67,03,120	59,39,415
19. October, 1960 ..	70,21,359	64,24,248
20. November, 1960 ..	60,69,475	57,26,454
21. December, 1960 ..	59,82,634	53,10,208
22. January, 1961 ..	55,95,238	52,42,554
23. February, 1961 ..	52,13,974	48,27,370
24. March, 1961 ..	56,85,117	49,37,043
25. April, 1961 ..	48,09,235	38,67,775
26. May, 1961 ..	50,63,000	44,96,916
27. June, 1961 ..	47,56,667	43,71,666
28. July, 1961 ..	55,75,667	44,11,377
29. August, 1961 ..	62,68,194	57,94,789
30. September, 1961 ..	66,55,512	54,07,976
31. October, 1961 ..	67,91,962	58,27,634
32. November, 1961 ..	59,25,696	49,78,226
33. December, 1961 ..	61,62,232	56,67,499
34. January, 1962 ..	60,23,489	49,62,627
35. February, 1962 ..	51,80,940	42,65,476
36. March, 1962 ..	56,84,706	44,58,112

The supply of electricity may broadly be categorised into four classes, namely, domestic, commercial, industrial and others. A detailed list of units sold from April, 1959 to March, 1962 have been stated in the above table.

The valuation against the total units sold from June, 1959 to December, 1961 is given below:—

Months.	Amounts in rupees.
1. June, 1959	2,83,365.48
2. July, 1959	3,03,123.27
3. August, 1959	2,89,735.01
4. September, 1959	3,59,209.67
5. October, 1959	4,52,439.47
6. November, 1959	5,02,022.95
7. December, 1959	5,00,041.61
8. January, 1960	4,56,090.62
9. February, 1960	4,88,276.44
10. March, 1960	4,98,644.61
11. April, 1960	4,61,493.98
12. May, 1960	4,23,465.11
13. June, 1960	4,18,961.25
14. July, 1960	4,43,582.52
15. August, 1960	4,69,839.90
16. September, 1960	5,90,136.94
17. October, 1960	6,04,908.49
18. November, 1960	6,74,061.72
19. December, 1960	5,90,134.80
20. January, 1961	Not available.
21. February, 1961	Ditto.
22. March, 1961	Ditto.
23. April, 1961	5,33,029.01
24. May, 1961	4,86,302.01
25. June, 1961	5,03,943.41
26. July, 1961	5,21,690.90
27. August, 1961	5,80,723.94
28. September, 1961	6,47,861.11
29. October, 1961	6,48,681.67
30. November, 1961	7,15,767.03
31. December, 1961	6,72,891.42

In Dhanbad proper there are 4,815 consumers out of which 4,163 belong to domestic group. The Dhanbad Electric Supply Company cannot supply adequate power for the requirements. The town of Dhanbad has had an enormous expansion in the course of the last one decade. The incidence of urbanisation will go up

and there is no doubt that in another ten years the requirements of electricity will go up much higher. In this connection it may be mentioned that Bihar has tremendously increased its power production in the recent years. In Bihar, the installed capacity of public supply undertakings was 202,978 Kw. in 1955, the corresponding generation being 440,322 million Kw. The installed capacity of the self-generating industrial plants was 285,322 Kw. 40 per cent higher than the above and the corresponding output was 891,509 million kw.

Various efforts have been made to increase the supply of electricity. In all a total investment of Rs. 10.89 crores was made during the First Plan period resulting in 7,000 Kw. of diesel capacity. The benefits of Damodar Valley Corporation system added over 150,000 Kw. of installed capacity. Progress in Bihar in the field of electrification has been striking although the progress falls far short of the requirements. The Bihar Government's plan envisages an outlay of Rs. 19.18 crores during the period of Second Plan.

There are four subdivisions of Electricity Department in Dhanbad district, namely, Dhanbad Electricity Supply subdivision, Nirsa Electricity Supply subdivision, Ganeshpur subdivision, and Digwadli subdivision.

Regarding the present low incidence of consumption of electricity it may be mentioned that high rate of electricity has resulted in less consumption of energy for domestic purposes.

A chart of the rates for the supply of energy immediately preceding September, 1959 is given below:—

Domestic Service—(Symbol DS).

- (i) *Applicability.*—To residential consumers for all *bona fide* domestic uses, including lights, fans, domestic pump sets and household appliances in single private dwellings and their appurtenances. Service to space in private dwellings which is used for office and professional work and occasionally used for business purpose by the customer is permitted where a portion of the dwelling is used regularly for the conduct of business, all energy used in the dwelling will be considered as non-domestic unless separate circuits are provided by the customer to permit separate metering and billing of energy used in business portion. This tariff does not apply to clubs, institutional homes, recognised tourist home, boarding houses, etc. Re-sale of sub-metering to tenants, other flats or household and other parties is strictly prohibited.

(ii) *Character of service.*—

- (1) A.C. 50 cycles, single phase, 230 volts for loads up to 3 Kw.

(2) A.C. 50 cycles, three phase, 400 volts for loads more than 3 kw.

(iii) *Tariff*.—First 30 kw. at 34 nP. per kw.

Next 50 kw. at 27 nP. per kw.

Next 220 kw. at 17 nP. per kw.

Above 300 kw. at 21 nP. per kw.

(iv) *Prompt Payment rebate*.—The rate is subject to a prompt payment rebate at 2 nP. per kw. provided the monthly bill, including arrear, if any, is paid in full by the date specified on the bill (15 days from the date of the bill).

Street Light Service.

(i) *Applicability*.—Applicable to street lighting system, including signal system and street lighting in municipalities, *Panchayats*, etc.

(ii) *Character of service*.—A.C. 50 cycles single phase 400/230 volts.

(iii) *Tariff*.—(a) Energy charge based on metered supply at 19 nP. per kw. Repairs and attendance charges will be at 30 nP. per lamp per month for ordinary fittings. Replacement of bulbs will be charged from the consumer.

(b) All-in-rate for unmetered supply, including energy, repairs and attendance, but excluding replacement of bulbs which will be charged at cost.

(i) For lamps up to 40 watt. at Rs. 1.20 per lamp per month.

(ii) For lamps of 60 watt. at Rs. 2.70 per lamp per month.

(iii) For lamps of 100 watt. at Rs. 4.20 per lamp per month.

(iv) For lamps of 200 watt. at Rs. 8.00 per lamp per month.

Commercial Service.

Applicability to all commercial and non-domestic consumers, such as business houses, cinemas, clubs, public offices, schools, hostels, hotels, Railway stations, etc., for light, fans, appliances and motors, whose total demands do not exceed 10 kw.

Re-sale and sub-metering to tenants, adjoining house and to other parties is strictly prohibited.

Character of Service.—A.C. 50 cycles, single phase 230 volts for demands up to 3 kw. and 3 phase 400 volts for demands above 3 kw. to 10 kw.

Tariff.—First 100 kw. at 34 nP. per kw.

Next 200 kw. at 27 nP. per kw.

All in excess of 300 kw. at 20 nP. per kw.

The rate is subject to a prompt payment rebate of 2 nP. kw. provided the monthly bill, including arrear, if any, is paid in full by the date specified on the bill (15 days from the bill). There will be a minimum charge of Rs. 1.28 nP. per month for each single phase service and Rs. 5 for each three phase service whether electricity is consumed or not.

Industrial Load.

Applicability to consumers with small and medium industrial load with a demand not exceeding 60 kw.

Character of Service.—A.C. 50 cycles, 3 phase, 400 volts.

Tariff.—All consumption at 15 nP. per kw. consumers under this category will be allowed energy for lighting directly and exclusively used for the operation of the industry or the pumps only on the above tariff.

High Tension Supply.

At the option of the company for large industrial consumers guaranteeing a minimum monthly payment of Rs. 250.00 transformer and all high tension equipment being provided by the consumer and energy being metered at low tension.

(1) *Tariff for supply at 33 kw.*—

SCHEDULE A.

(a) Available to all power consumers for loads of 1,500 KVA to 30,000 KVA.

(b) *Character of service.*—A.C. 50 cycles three phase.

(c) *Tariff.*

Demand charge.—First 2,000 KVA—Rs. 8.50 per KVA per month.

Next 3,000 KVA—Rs. 7.50 per KVA per month.

Above 5,000 KVA—Rs. 6.50 per KVA per month.

Energy charge.—First 3,00,000 kw. per month—Re. 0.40 per kw.

Next 7,00,000 kw. per month—Re. 0.34 per kw.

All excess over 10,00,000 kw. per month—Re. 0.31 per kw.

SCHEDULE B.

(a) Available to all power consumers for loads above 15,000 KVA up to 30,000 KVA.

(b) *Character of service.*—A.C. 50 cycles 3 phase.

(c) Tariff.

Demand charge.—First 5,000 KVA—Rs. 9.00 per KVA per month.

Next 10,000 KVA—Rs. 8.00 per KVA per month.

Above 15,000 KVA—Rs. 7.00 per KVA per month.

Energy charge.—All energy consumption per month—Re. 0.28 per kw.

(2) *Tariff for supply at 11 KVA—*

(a) Available to power consumers and distributing licenses for loads at 75 KVA and above.

(b) *Character of service.*—A.C. 50 cycles 3 phase.

(c) Tariff.

Demand charge.—First 500 KVA—Rs. 9.00 per KVA per month

Next 1,500 KVA—Rs. 8.50 per KVA per month.

Next 3,000 KVA—Rs. 8.00 per KVA per month.

Above 5,000 KVA—Rs. 7.50 per KVA per month.

Energy charge.—First 50,000 kw. per month—Re. 0.50 per kw.

Next 1,50,000 kw. per month—Re. 0.46 per kw.

Next 3,00,000 kw. per month—Re. 0.40 per kw.

Next 5,00,000 kw. per month—Re. 0.38 per kw.

All excess over 10,00,000 kw. per month—Re. 0.35 per kw.

Energy for factory lighting up to ten per cent of the total monthly off take will be allowed at the above rate. Any consumption in excess of ten per cent will be charged for at the standard lighting rate.

LARGE-SCALE INDUSTRIES.

The main large-scale industries of this district are—

(1) Firebricks Industry.

(2) Fertiliser Factory.

(3) Coke oven Plants,

- (4) Cement Factory.
- (5) Lead and Silver Plant.
- (6) Glass Factory.

It may be mentioned that there are no textile mills, jute mills, sugar factories, paper mills in this district. There is also no industry manufacturing machine tools and automobiles. One heavy industry, viz., Bokaro Steel Plant is proposed to be set up at Marafari in Chas thana of this district which is at a distance of about 30 miles from Dhanbad. This may be the biggest steel plant in India.

LARGE-SCALE INDUSTRIES AND MANUFACTURE OF THIS DISTRICT.

Coke Oven Plants.

The Bararee Coke Company, Limited located at Kusunda, Dhanbad, is a highly mechanised plant. This factory is manufacturing sulphuric acid, coke, coal tar, coal pitch, medium coal oil (disinfected fluid), barcolene, middle oil, creosote oil, anthracene and naphthalene. It is working three shifts per day and the average number of persons employed per month is in the following manner:—

Workers as defined under the Factories Act.			Average no. of persons employed during December, 1961.	Average no. of persons employed in the corresponding months of previous year.
1. Supervisors	..	..	11	11
2. Clerical	..	..	13	12
3. Skilled	..	..	46	88
4. Semi-skilled	..	..	70	51
5. Un-skilled	..	..	297	232
6. Others	..	..	12	18

The main raw material of this industry is coal which is made available locally and the main market is Calcutta. There are two coke plants in the district one at Loyabad and the other is at Lodna.

(a) Loyabad coking and byc-products recovery plant is located at Bansjora in this district. Here again, it may be mentioned that coal is the main raw material of this unit. Average quantity of coal and electricity consumed per month is 10,700.00 tons of coal and 70,000 units of electricity as reported by the Industries Department, Dhanbad,

The statement below supplied by the office of the District Industries Officer, Dhanbad will give the details of finished products and bye-product:—

Period.	Name of the products.	Value in rupees.
March, 1960	1. Hard coke	3,53,753.40
	2. Soft coke	2,879.00
	3. Coke breeze	1,848.00
	4. Sulphate of Ammonia ..	22,140.00
	5. Coal Tar	22,000.00
	6. Phenyl	607.06
March, 1961	1. Hard coke	3,22,198.80
	2. Soft coke	7,427.82
	3. Coke breeze	1,925.00
	4. Coal Tar	22,000.00
	5. Sulphate of Ammonia ..	19,372.50
	6. Phenyl	555.00
March, 1962	1. Hard coke	3,53,753.40
	2. Soft coke	2,879.00
	3. Coke breeze	1,848.00
	4. Coal Tar	22,140.00
	5. Sulphate of Ammonia ..	22,000.00
	6. Phenyl	667.06

The figures of average number of persons employed per month is given below—

March, 1960	.. ..	417.96
March, 1961	.. ..	438.35
March, 1962	.. ..	441.03

The market of the manufactured items is Calcutta where it is in bulk consumed.

(b) *Lodna coke plant.*—This factory was established in 1920. The factory is located at Lodna. The manufactured items are coke and tar. Coal is the main raw material of this industry which is made available locally, i.e., Jharia. The market of the manufactured items is local and West Bengal and also other parts of this State. The average number of persons employed during the years 1960 and 1961 were 356.5 and 340.2 respectively.

The statement below shows the average product of this firm since 1956:—

Year.	Quantity produced.	
	Coke.	Tar.
1956	4,559.9 tons	162.9 tons.
1957	7,229.5 tons	261 tons.
1958	8,037.0 tons	270.3 tons.
1959	5,534.4 tons	170.5 tons.
1960	7,220.4 tons	246.6 tons.
1961	6,765.3 tons	222.1 tons.

There is one more coke plant at Bhowra in this district. The raw materials consumed in the factory are coal and oil, soft goods, iron and steel, tools and electricity. The name of the products and bye-products are hard coke, coal tar, pitch road tar and light creosote. The average number of persons employed per day during 1961 was 168. The price of coke during the year 1957 was Rs. 44.44 per ton, coal tar Rs. 100 per ton, tar Rs. 225 per ton, light creosote oil Rs. 1.87 per gallon.

GLASS INDUSTRY.

In 1958, there were eight glass factories in Bihar and in Dhanbad district there was one, viz., Khandelwal Glass Works located at Chota Ambona. The main products of this industry is glass lamp, jar and bottles, etc. The most commonly used raw materials are sand, borax, soda ash, salt cake, dolomite, limestone, saltpetre, sulphur and other materials. Sand which constitutes 70 per cent of the materials is available in the various parts of the country and it is transported from Uttar Pradesh. Borax is not found in India and has to be imported from U. K. and U. S. A. There are abundant supply of good quality of dolomite, saltpetre and limestone in this State and in the neighbouring States of U. P. from where it is brought in this district.

The average number of persons employed per day in 1961 in this factory was 620 and its average monthly value of production was Rs. 1,96,444. The markets of the products of this factory are generally local but they are also sent to West Bengal, Orissa, Assam and Andhra Pradesh. One thing is to be noted that the raw materials are not standardised and often vary from consignment to consignment. For instance, Mahabir Glass Factory which was located at Chirkunda is closed at present.

SMALL-SCALE AND COTTAGE INDUSTRIES.

There are different types of small-scale and cottage industries in the district which are mentioned below:—

- (1) Tar chemicals.
- (2) Soap industries.
- (3) Sodium silicate.
- (4) Timber and furniture works.

- (5) Electrical goods and manufacturing industries.
- (6) Re-rolling mills.
- (7) Engineering industries.
- (8) Foundry workshop.
- (9) Food processing industries.
- (10) Printing press industry.
- (11) Leather and footwear industry.
- (12) Stone-crushing industry.
- (13) Tassar industry.
- (14) Building industry.

Tar Chemicals.—The Bengal Tar Products which is located at Pradhankhanta in this district is a partnership firm. This place is at a distance of seven miles from Dhanbad Railway Station. It manufactures road pitch mainly. At present (1962) the factory is getting difficulty in the supply of coal tar whose supply has become very scarce. The present strength of employees in the factory varies from 50 to 70 per day. Recently it has taken up a programme of manufacturing insecticides but the scheme has not been approved by the Central Government. The market of the road pitch is mainly local, Patna, Jamshedpur and Ranchi.

Other tar and pitch manufacturing industries working on small-scale basis are Shalimar Tar Products at Lodna, Salkia Distillery and Chemicals Company at Chasnala and Katras Tar Products at Katrasgarh.

Soap Industry.—In this district and specially in coalfield locality the soap industry has flourished well. The reason behind it is that the main consumers of these washing soaps locally produced are colliery labourers and often middle class people. They work in the collieries and the industries, they have got ready money with them and so they have sufficient purchasing capacity. The labourers are paid weekly either on Sunday or on any holiday.

The soap factories which are in the district may be mentioned as follows:—

- (1) Dewat Ram Dulichand Soap Factory, Jharia.
- (2) "V" Soap Factory, Jharia.
- (3) M/s. Sheo Karandan Kulasam, Jharia.
- (4) M/s. Bahukund Soap Factory, Jharia.
- (5) M/s. Azad Soap Factory, Jharia.
- (6) M/s. Arora Soap Factory, Jharia.
- (7) M/s. Bharat Soap Factory, Jharia.
- (8) M/s. Jharia Soap Factory, Jharia.
- (9) M/s. Shroff Soap Factory, Jharia.
- (10) M/s. Md. Sami and Md. Yakub Soap Factory, Jharia.

It may be noted that these factories are all located at Jharia and the soaps are sent to other parts of the district. The first four factories produce about 100 tons of washing soaps per year and recently they have come under the Central Excise tax limit as a result of which they have to pay the excise duty. The strength of labourers varies from 5 to 14.

Besides, there are some soap factories in the district the names of which are given below:—

- (1) Dwarka Soap Factory, Dhanbad town.
- (2) Hari Soap Factory, Dhanbad town.
- (3) Punjab Soap Factory, Dhanbad town.
- (4) Bajrang Soap Factory, Kerkend.
- (5) Luxmi Soap Factory, Katrasgarh.
- (6) Hanuman Soap Factory, Nirsa.
- (7) Sunder Soap Factory, Chirkunda.

These are registered small-scale industries under the Directorate of Industries, Bihar. These industries require oils of different kinds, caustic soda, sodium silicate, soap colour, assomatic chemicals, tallow, etc. They are getting import licences to import palm oil, copra, tallow, assomatic chemicals on the recommendation of the Director of Industries, Bihar. The Director of Industries issues essentiality certificate for the above items on the recommendation of the District Industries Officer. On the basis of essentiality certificate issued by Director of Industries, Bihar, Joint Chief Controller of Imports and Exports, Calcutta issues the import licences.

(3) *Sodium Silicate*.—It has already been mentioned that silicate of soda is an important raw material for the soap industries. There are four factories which manufacture sodium silicate in the district. They are—

- (1) M/s. Brijia Silicate and Chemical Company, Jharia.
- (2) M/s. Jharia Silicate Works, Jharia.
- (3) M/s. Bharat Glass and Silicate Works, Jharia.
- (4) M/s. Durga Silicate Works, Chirkunda.

The raw materials required for the industry are soda ash, silica sand, chilean nitrate, bleaching powder, etc. Soda ash and silica sand both are made available in plenty in U.P. from where it is transported. The other raw materials are imported from Calcutta. Steam coal is easily available. The markets of the product are in Dhanbad, Chaibasa, Jamshecpur, Madhupur, Deoghar, Asansol, Bermo and Ranchi. The average production of silicate of soda per year in the case of Brijia Silicate and Chemical Company, Jharia is 340 tons whereas Jharia Silicate Works produces 320 tons per year. One of the main drawbacks of these industries in the

district is that the method of production is crude and outdated. There is sufficient scope for improvement in the production method. Brijia Silicate and Chemical Company, Jharia and Jharia Silicate Works are registered as small-scale industries under the Directorate of Industries, Bihar, Patna.

Timber and Furniture Industries.—Collieries require a good quantity of wood both under the mines and outside the mines. Wood in the form of poles are required in huge quantity by almost all the collieries. Wood is generally brought from Chakradharpur, Chaibasa and Manoharpur in Singhbhum district. Some of the important industries engaged in sawing of wood are the following:—

- (1) Eastern Timber Trading Company, Jharia.
- (2) Prabhat Saw Mill, Jharia.
- (3) Ganesh Saw Mill, Jharia.
- (4) Luxmi Saw Mill, Jharia.
- (5) Shyamji Timber Company, Bhaga Road, Jharia.
- (6) Hetram Sharma Timber Works, Jharia.
- (7) Ram Gopal Agarwalla Timber Works, Dhanbad town.

Timber of various categories and size are supplied to collieries from sawing mills.

Besides, a good number of furniture making industries have grown up to meet the domestic and official need of articles of furniture of this district. Every colliery whether big or small has got some office where articles of furniture are needed. Secondly, in Dhanbad district, various Central Government offices are located from whom there is a good demand of furniture. Some of the important furniture making industries are the following:—

- (1) Royal Timber Corporation, Jharia.
- (2) Guru Nanak Furniture Works, Jharia.
- (3) Vishwakarma Furniture Works, Jharia.
- (4) Wood Craft Works, Dhanbad.
- (5) Durga Timber Works, Govindpur.

There is one small-scale unit M/s. Steel Furniture and Allied Industries, Jharia, which manufactures *de luxe* steel combined with plastic cane furniture. The raw materials like steel bars are procured from the open market and plastic cane is brought from Calcutta. The market is practically local.

Electrical Goods Manufacturing Industries.—There are specially three units in Dhanbad which manufacture electrical accessories. Mention may be made of M/s. Bharat Electric Company, Dhanbad which manufactures switches. It is equipped with up-to-date machineries. The factory is located near Dhanbad Railway Station.

It also manufactures grease nipples, whose demand is mostly from Tisra. The other unit M/s. Shree Ram Krishna Engineering Works, Naya Bazar, Dhanbad manufactures earth leakage. The demand of this product is at present from the collieries of Dhanbad district. Other products of this unit are colliery equipments like bush bar panels, helmets, cable boxes and trailer.

Re-rolling mills.—There are three re-rolling mills in the district. They are given below:—

- (1) M/s. Dhanbad Industries, Dhanbad.
- (2) M/s. Sindri Re-rolling Mills, Chasnala.
- (3) M/s. Eagle Re-rolling Mills, Kumardhubi.

These three factories are re-rolling various categories of steel like bars and rods. They get billets and other steel materials for re-rolling purposes on the recommendation of the Director of Industries, Bihar, Patna. The markets of bars and rods are local and in the districts of Hazaribagh, Ranchi and Santhal Parganas, etc.

General Engineering and Repairing Workshops.—Engineering industries have an important place in the area of industries of this district. These industries act as a feeding industry to the coal mining industries of this district. With the expansion of the coal mining industry and the increased raising of coal from the mines, these engineering industries have expanded simultaneously. They manufacture those machineries and equipments which are mostly required in collieries. They are coal tubs, centrifugal pumps, tube-wheels, bush bar bands, cable boxes and haulage.

(a) M/s. MEMCO manufacture mining machinery like haulage. This factory is equipped with modern types of machineries and with very skilled technicians. This industry is of its own kind in this State. The average number of persons employed per day is 96 and the average value of production per month is Rs. 80,000. Other items of manufacture are pumps, airbrake switches, oil circuit brakes, controller resistances, cable boxes and distribution panels.

(b) *Barbed wire making units.*—M/s. Bihar Steel and Wire Products, Jharia, M/s. Sindri Iron Foundry, Limited and M/s. India Trading Corporation, Dhanbad are the three units in the district. These units manufacture barbed wire.

(c) *Wire nails manufacturing unit.*—Hind Electricals and General Industries, Dhanbad manufacture wire nails. The average number of persons employed per day is 21.

(d) *Coal tubs manufacturing units.*—There is a huge demand of coal tubs from the collieries for raising coals from the coal mines. The important small-scale units manufacturing coal tubs in this district are:—

- (1) Mehta Engineering Works, Dhanbad.
- (2) Basta Colla Engineering Works, Dhanbad.

- (3) Carena Engineering Works, Bansjora, Dhanbad.
- (4) East Katras Engineering Works, Katrasgarh.
- (5) Ruby Engineering Works, Katrasgarh.
- (6) Ganeshpur Engineering Works, Ganeshpur.
- (7) Shri Krishna Engineering Works, Jharia.
- (8) Jain Hardware Engineering Works, Katrasgarh.
- (9) Ekra Engineering Works, Katrasgarh.
- (10) Kumardhubi Engineering Works, Kumardhubi.

The production method of these units are outdated and the steel sheets are not sheared by the machineries.

Repairing Workshops.—The concentration of traffic has included the development and growth of numerous automobile repairing workshops at Dhanbad and Jharia. The highly equipped workshops are Howrah Motors, Limited, Dhanbad; Sudarshan Motors, Dhanbad; Rajno Motors, Dhanbad; Sardar Engineering Works and Acme Garage Works, Dhanbad. Nayabazar in Dhanbad town is the nucleus of the repairing units where hundreds of repairing units are localised.

Trunks and Suitcase Making Industry.—There are four important small-scale units which manufacture steel trunks and suitcases in this district. They are as follows:—

- (1) Bantu Steel Trunk Factory, Jharia.
- (2) Jagdish Prasad Badri Prasad Factory, Jharia.
- (3) Best Steel Trunk Factory, Dhanbad.
- (4) A. Hassan Trunk Factory, Dhanbad.

These are registered fabricators and they get the controlled materials like sheets from the local stockist. The markets are local.

Agricultural Implements and Domestic Utensils Making Industry.—There are two units, viz., Kedar Industries at Chasnala and Devendra Cottage Industries at Jharia which used to manufacture agricultural implements and domestic utensils. The industry of Chasnala generally manufactures agricultural implements and Devendra Cottage Industries manufacture domestic utensils.

Foundry Works.—The Jaiswal Trading Company, Gandhi Road, Dhanbad casts new metric weights. It also casts some other railway equipments. The Sindri Iron Foundry casts railway slippers. Besides this there are some other foundry workshops where various categories of colliery equipments are manufactured by the process of casting. They are Shri Krishna Engineering Works, and United Engineering Works located at Jharia. The industries have about 1,500 workers.

(1) *Food Processing Industries.*—Ram Krishna Oil Mill is the only oil mill functioning in the district which is located at Naya-bazar, Dhanbad. The average number of persons employed per day is about ten. Mustard seeds and linseed are brought from Uttar Pradesh. The market is mostly local.

(2) *Dhanbad Flour Mill.*—It is located at Dhaiya which is at a distance of two miles from Dhanbad Railway Station. It has received financial assistance from the State Financial Corporation, Patna. It manufactures flour. About forty persons are employed per day. The market is mostly local.

Besides, there are a large number of flour mills employing three to four persons but they are scattered throughout the district.

(3) *Rice-Milling Industry.*—Though the district is industrial but it can be said to be a rice producing district. A list of such mills with average daily crushing capacity is given below:—

Name of mills and place.	Average daily crushing capacity. Tons.
1. Hanuman Rice Mill, Katrasgarh ..	10
2. Chirkunda Rice Mill, Chirkunda ..	20
3. Dutta Rice Mill, Nirsachatti ..	15
4. Shri Ram Haridwarilal Rice Mill, Chirkunda.	11

There are several more rice mills of smaller capacity in the district. The labour force required for the industry is mostly unskilled and they are recruited from the local population. Since the industry is of more or less seasonal nature labourers have to be watchful for their employments.

Lozenges and Bakery Industries.—As regards bakery industry it may be noted that there is one factory, viz., Mack and Company located at Dhanbad which makes pastries, cakes, etc. Its product is very popular in the colliery areas and it gets a good market. Besides, there are more units, viz., Swaran Bakery Company, etc., located at Sindri.

There are some lozenge making units also in the district. They are Thakurdas and N. Saha Lozenge Company at Dhanbad and Govindpur respectively.

Printing Press Industry.—This industry has flourished tremendously in recent years. The important printing presses are mentioned below:—

- (1) Kamla Printing Press, Jharia.
- (2) Star Printing Press, Jharia.
- (3) Eastern Printing Press, Jharia.
- (4) National Printing Press, Jharia.

- (5) Sheoraj Printing Press, Jharia.
- (6) Yugantar Printing Press, Jharia.
- (7) New Sketch Press, Dhanbad.
- (8) Art Press, Dhanbad.
- (9) Shree Press, Katrasgarh.
- (10) Janmat Press, Dhanbad.

Besides, there are leather and footwear industry, stone crushing industry, *gur* and *Khandsari*, carpentry and blacksmithy industries in the district.

Khadi and Village Industries.—It will not be out of place to mention here that under Khadi and village industries, the district is not important. The weaving of cotton and wool is an important occupation to the majority of the Adibasis. The hand-woven cloth, which though coarse is durable, is mostly seen amongst the aboriginal and the semi-aboriginal tribes. The blockwise list of some industrial societies is given below:—

	No. of village Straw co-op. societies.	Palm <i>gur</i> making.	Hand pounding of rice.
1. Govindpur Block	3	..	1
2. Tundi Block	1	1	1
3. Chas Block	..	..	1
4. Topchanchi Block	2	..	..

Outside the block areas, there are three oil *ghani* societies which are functioning at Dhanbad, Jharia and Katras. They have received financial assistance from State Khadi Board. The products are generally sold locally. One cottage industries emporia was started at Jharia in 1962.

Tassar Industry.—Tassar industry is comparatively recent in the district and is confined to a very small area. The industries are located at Chas, Govindpur and Tundi areas of this district. The State Government has started two tassar sub-stations at Chas and Tundi. The main function is to train the tassar rearers in rearing and spinning. It is only in these three *thanas* that the host trees for eri-silk worm, i.e., castor plants are grown. The Agriculture Department of the State Government have taken some initiative to distribute eri-silk worms. Officers of the Government tour in the villages. They demonstrate and introduce a rational method of rearing eri-silk worms and spinning of eri-silk yarn. Though the industry is in its infancy, its future seems to be bright.

Bidi Industry.—Bidi industry keeps engaged more than fifteen hundred persons most of whom are *bidi* manufacturers (about one thousand approximately). There will also be a couple of hundreds of men engaged as driers, packers, and tobacco cleaners. It is peculiar

that both the ingredients of the outer leaf and the tobacco are imported from outside. There is also a very large consumption of *bidi* within the district.

Building Industry.—The incidence of urbanisation in Dhanbad district has been remarkable. Dhanbad, Jharia, Sindri and other towns have expanded enormously in the last two decades and other townships are developing. The more availability of cement and steel has led to a change in the pattern of the houses. Instead of mud and brick houses more of reinforced brick and reinforced concrete houses are being built. There has been a great expansion of Government offices at the district headquarters and a number of institutions have now been located in Dhanbad. In this district there are many offices sponsored by Central Government. All this has led to a sizeable population being engaged in what may be loosely described as building industry.

This building industry has spread to many of the rural areas as well. The location of the block headquarters at important villages has led to the construction of a number of *pucca* houses for Block Development Office and residential houses. The well-to-do villagers have also come to appreciate better houses to live in and houses with modern comforts are coming up in many villages.

The building industry has kept engaged people in different types of work. Broadly speaking they are brick layers, carters, truck owners and drivers, masons, carpenters, etc. Stockists of coal, bricks, cement, lime, iron rods, etc., have been cropped up in the urban areas. It is understood that there are now 20 brick-kilns in the town of Dhanbad. Besides, there are brick-kilns at Jharia, Sindri, Tundi, Nirsa, Katras and other townships. The craze for brick-built houses in the rural areas has led to a very large number of brick-kilns in the rural areas. On a rough estimate more than 1,000 persons are engaged at the brick-kilns of Dhanbad alone.

It may be mentioned here that after the earthquake of 1934 there was a craze for building light structures and attempt was made to manufacture Raniganj tiles near Jharia. But as mentioned before as more cement and steel rods were available people took to brick, cement and steel for building stronger houses and Raniganj tiles fell into disuse. Similarly the manufacture of country tiles (*khapra*) in the urban areas has considerably declined because of the increase in demand for houses of cement and steel. Corrugated sheets and asbestos sheets are also largely used for roofing.

Building industry will receive a further encouragement now that schemes for housing the lower income-group and small income-group have been sponsored by the State Government. The State is giving loans to further such schemes. To cope with the demand for more bricks, loans are being given to the brick-kilns and better arrangements for coal, cement and steel are being made in the district.

INDUSTRIAL POTENTIAL AND PLANS FOR FUTURE DEVELOPMENT.

Dhanbad is an important district from the point of view of industries. Industries based on extractive raw materials appear to have greater scope for expansion on a large scale than industries based on agricultural raw materials. Industries based on metallic minerals have expansion potential on a large as well as small scale.

Availability of coal, power, raw materials and presence of entrepreneurs and technical skill could accelerate the development of industries in this district.

The industrial potential of the district has not yet been properly surveyed. The Techno-Economic Survey of Bihar while discussing the "New Industrial Opportunities" has observed, "In 1955, Bihar had four registered units located at Hazaribagh, Dhanbad, Singhbhum and Monghyr employing 1,552 workers with a production capital of Rs. 134.8 lakhs. Annual production was valued at Rs. 57.4 lakhs and value added by manufacture at Rs. 8 lakhs or 4 per cent. Glass sheet and plate constituted nearly 90 per cent of the total imports. The market demand for glass ware, particularly glass sheets and plates is considerable and is likely to increase in the future. There are good prospects for exporting sheet glass to Ceylon, Africa, Burma, Palestine and Indonesia. All major raw materials are locally available. With State assistance in procuring machinery and easing bottlenecks in the way of transporting raw materials and coal, the industry has good prospects for expanding manufacture of sheet and plate glass at Dhanbad.

"The utilization of the Amjor pyrites for the recovery of sulphur and manufacture of sulphuric acid is, therefore, worth serious consideration. The most favourable location for the plant is Amjor as the sulphur produced can be moved more easily than pyrites. The project would provide employment for 100 to 200 persons exclusive of mining which would employ about 400 persons. The best location would be Sindri where the acid produced could be utilised by the Superphosphate Factory."*

The Techno-Economic Survey of Bihar further observed, "The plant could be located near Sindri where the petroleum coke, which is the raw material for the graphite electrode, will be produced when the refinery comes into operation."†

In the Third Five-Year Plan the Fourth Steel Plant is proposed to be established at Maraphari located at a distance of about thirty miles from Dhanbad town. At present (1963) it is just in the initial stage and about 50,795 persons are to be displaced in this project.

* Report of the Techno-Economic Survey of Bihar conducted by National Council of Applied Economic Research, New Delhi, 1959, Volume One (pp. 110—112).

† *Ibid*, p. 110.

The Plant area will be quite close to the east of the Railway line, Chandrapura to Muri near Maraphari Railway Station of the South-Eastern Railway in Dhanbad district. The township will cover 7.5 square miles. The potential capacity of the produce will be 10 million tons during the Third Five-Year Plan period.

The main power requirements of the plant are intended to meet from the power house under execution by Damodar Valley Corporation near Chandrapura on the northern bank of Damodar river. When completed there will be considerable changes in the economy of the district.

1. *Expansion of the Superphosphate Factory at Sindri.*—The State Government have established a Superphosphate Factory at Sindri. A scheme for the expansion of this factory so as to raise its annual production capacity to 50,000 tons was included in the Second Five-Year Plan. But on account of difficulties of foreign exchange and certain other factors it is not likely that the expansion scheme will be taken up during the currency of the Second Plan. It is, therefore, proposed to include the expansion scheme in the Third Plan at an estimated cost of Rs. 50 lakhs. This expansion scheme has already been approved by the Government of India's Licensing Committee.

2. *Temperature Coal Carbonisation and Bye-product Recovery and Bricketing Plant.*—At present the domestic fuel is made either by burning the coal in open air or in small coke ovens whose efficiency is very low. Moreover, all the gaseous products which may be used for the manufacture of a number of bye-products such as coal tar and phenyl, etc., are left to the atmosphere. In the present plant the ratio of coal to coke will be 1 : 3 to 1 : 0 whereas in existing units it is about 1 : 6 to 1 : 0. The high ash content coal may be used for the purpose and the low ash content coal may be reserved for metallurgical purposes. This may be located preferably near Sindri, where power and water may be made easily available by the Bihar State Electricity Board and from Damodar river. At present about $1 : 7 \times 10^6$ tons of coal is used for coke in which all the bye-products are wasted. In Bihar the requirements of coke are about 3 to 4 million tons for domestic fuel. This will cost Rs. 4.5 crores and will employ about 600 persons.

3. *Electrical Insulation Tapes.*—There is no factory for the manufacture of Electrical Insulation Tapes in India. There is a good market of this product. This factory may serve the requirements of West Bengal, Bihar, Orissa, Assam and Uttar Pradesh, etc. There may be any suitable site in Dhanbad district with a siding but preferably Sindri would be a good site. The estimated cost is Rs. 1.2 crores and the employment potential will be 200.

Refrigerator, Air Cooler, Air Condition and Water Cooler.—There is a growing demand of refrigerator and air-conditioning units in India. The iron and steel for the factory may be available from

Durgapur, Burn and Company, Tata Iron and Steel Company and Bokaro Steel Plants. There is good metallurgical coke available in Dhanbad district for the manufacture of the equipment and any suitable site in the district with a siding will serve the purpose. This will cost almost Rs. 3.25 crores and will employ about 1,000 persons.

5. *Electrical Motors, Fans, Pumps and Transformers, etc.*—There is a good prospect of this industry as Electric Motors and other items are required in mining and other industries. The site could be at any part of Dhanbad district with a siding. The estimated cost will be 1.5 crores and will employ about 1,200 persons.

Medium and Small-Scale Industries.

1. *Re-rolling Mill.*—There is growing demand of rods, flat and bars, etc. The advantage in locating this industry in this district will be the availability of metallurgical coke in Dhanbad, Iron and Steel from Durgapur, Burnpur, Jamshedpur and Bokaro Steel Plant at Marapliari near Chas police-station in Dhanbad. The site will be located at Mohuda. The estimated cost will be Rs. 8 crores and the employment potential is 500.

2. *Wire Nail, Wood Screw, Bolt, Nuts and Door-Fittings.*—A number of small-scale units can be started for the manufacture of these articles at an estimated cost of Rs. 50 lakhs. This will employ about 1,000 persons. The site will be at Dhanbad on Dhैया Road. The consumption possibilities within the district are enormous.

3. *Machine Tools Manufacturing Industries.*—There is a demand of Lathe, Drill and other machine tools, etc., which can be started at Dhanbad on Dhैया Road at an estimated cost of Rs. 30 lakhs. Iron and steel and coke will be readily available in the district and the consumption possibilities within the district are great.

The ancillary industry of dairy-farming has potential for the district. There is acute shortage of milk in the district and as such this unit will have a good prospect. One good dairy farm will be started at Dhanbad on Dhैया Road at an estimated cost of Rs. 10 lakhs and it will employ about 100 persons. Pastoral lands could be acquired. The urbanisation of some places on or near Grand Trunk Road, like Govindpur, Kumardhubi, Maithon, etc., assures ready consumption of the produce.

Industrial Estates.

The establishment of Industrial Estates has already come to be recognised as a positive means to achieve decentralisation and dispersal of industry. The four Industrial Estates set up at Patna, Biharsharif, Darbhanga and Ranchi during the Second Plan have been helpful in building up an industrial outlook and for stimulating investment in consumer goods' industries.

Accordingly, in the light of the recommendations of the working group set up by the Government of India for small-scale industries, the following schemes of Industrial Estates have been proposed in the Third Five-Year Plan in Bihar:—

- (i) Two units of large Industrial Estates at an estimated cost of Rs. 15 lakhs each for towns having population ranging between 50,000 and 1,00,000.
- (ii) Two units of small Industrial Estates at an estimated cost of Rs. 10 lakhs for towns having population between 20,000 and 50,000.
- (iii) Ten units of small Industrial Estates at an estimated cost of Rs. 5 lakhs each for towns having population between 5,000 and 20,000.
- (iv) Fifty units of workshop sheds for village artisans at an estimated cost of Rs. 10,000 each in rural towns having less than 5,000 population.

The total outlay on these schemes, therefore, is kept at Rs. 20,000 lakhs for the entire Third Plan period.

There has been, so far, no steps taken to start an Industrial Estate anywhere in Dhanbad. Dhanbad has got 19 towns and there is no doubt that some Industrial Estates are likely to be started sooner or later.

LABOUR AND EMPLOYERS' ORGANISATION.

Dhanbad district is very well industrialised. The employers have got very effective organisations in the district. The industries of the district require both skilled and unskilled labour. Most of the unskilled labourers employed in different factories come from within the district itself. The supply of skilled personnel comes from not only neighbouring districts, i.e., Hazaribagh, Santhal Parganas, Ranchi but also from outside India, specially the supervisory staff. There are organised labour unions in different industries but the union of *Coal Mazdoor Sangh* at Jharia is remarkably well organised and influential. It may be mentioned that generally it is taken that the labourers are more conscious of their rights than their obligations. Some of these labour organisations make themselves occasionally felt by threatening strikes complete or partial.

Following is the list of registered labour unions in Dhanbad district till 31st March, 1961:—

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
1	The Loyabad Coke Plant Workers' Union, P. O. Bansjora (Dhanbad).	33	4th December, 1940	A.I.T.U.C.
2	Loyabad Power House Workers' Union, P.O. Bansjora, district Dhanbad.	37	29th April, 1941	I.N.T.U.C.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
3	Bhowra Coke Plant Workers' Union, Bhowra, district Dhanbad.	81	15th June, 1946 ..	A.I.T.U.C.
4	Indian Collieries' Union, Katrasgarh, district Dhanbad.	96	4th September, 1946	H.M.S.
5	Motor Workers' Union, Naya-bazar, district Dhanbad.	100	20th June, 1946 ..	H.M.S.
6	Hindustan Khan Masdoor Sangh, Balihari, P. O. Kusunda (Dhanbad).	111	24th January, 1947	U.T.U.C.
7	East Indian Coal Company Workers' Union, Bhowra, P. O. Jealgora (Dhanbad).	119	4th February, 1947	Not affiliated.
8	Eastern Coal Company Colliery Workers' Union, Bhowra, P. O. Jealgora, district Dhanbad.	122	4th February 1947	A.I.T.U.C.
9	Permit Managers' Union, P. O. Sijua, district Dhanbad.	129	8th March, 1947 ..	Not affiliated.
10	Metal Corporation Workers' Union, Tundoo, P. O. Nawagarh (Dhanbad).	148	6th June, 1947 ..	I.N.T.U.C.
11	Kumardhubi Workers' Union, Kumardhubi, district Dhanbad.	153	20th June, 1947 ..	I.N.T.U.C.
12	Nirsha Thana Coalfield and Workshop Workers' Union, P. O. Nirsachatti, district Dhanbad.	156	3rd July, 1947 ..	Not affiliated.
13	Bihar Firebricks and Potteries Workers' Union, P. O. Mugma, district Dhanbad.	160	6th July, 1947 ..	I.N.T.U.C.
14	Ashkuti Fulartand Labour Union, P. O. Katrasgarh, Dhanbad.	188	28th September, 1947	Not affiliated.
15	Reliance Pottery Workers' Union, P. O. Pottery Works, Chanch Chirkunda, district Dhanbad.	190	5th October, 1947 ..	I.N.T.U.C.
16	Basdoopur Colliery Workers' Union, P. O. Colliery Kusunda, district Dhanbad.	192	8th November, 1947	Not affiliated.
17	Mayra Coalfield Workers' Union, Sanga Mahal, P. O. Mugma, district Dhanbad.	204	18th November, 1947	I.N.T.U.C.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
18	Kharkharoo Ganespur Labour Union, Kharkharoo Colliery, P. O. Katrasgarh, district Dhanbad.	205	19th November, 1947	I.N.T.U.C.
19	Bhulan Bararoo Coal Company Workers' Union, P. O. Patherdih (Dhanbad).	206	19th November, 1947	Not affiliated.
20	Mahuda Power Station Workshop Workers' Union, Bhurangya Colliery, P. O. Mahuda, district Dhanbad.	219	19th December, 1947	U.T.U.C.
21	Gilfarbari Mazdoor Union, Gilfarbari, P. O. Mugma (Dhanbad).	224	10th January, 1948	I.N.T.U.C.
22	Electric Workers' Union, Jharra, district Dhanbad.	249	14th March, 1948	I.N.T.U.C.
23	Sindri Workers' Union, Sindri, district Dhanbad.	262	14th March, 1948	I.N.T.U.C.
24	Kasta Coalfield Mazdoor Union, Palash Toli Colliery, P. O. Ghurulia, district Dhanbad.	270	1st April, 1948	Not affiliated.
25	New Teturiya Colliery Workers' Union, Malkora, district Dhanbad.	289	24th May, 1948	Ditto.
26	Coal Superintendents' Employees Association, P. O. Dhanbad (Dhanbad).	290	20th October, 1948	I.N.T.U.C.
27	Hazaribagh and Manbhum Collieries Labour Union, North Damodar Colliery, P. O. Nudkharkee, district Dhanbad.	320	21st January, 1949	Not affiliated.
28	Khas Govindpur Colliery Labour Union, Katrasgarh, district Dhanbad.	331	17th February, 1949	Ditto.
29	Benidih Coal Concern Labour Union, Benidih Colliery, P. O. Nudkharkee, district Dhanbad.	352	12th April, 1949	Ditto.
30	East Katras Khan Mazdoor Union, P. O. Katrasgarh, district Dhanbad.	359	7th April, 1949	Ditto.
31	Sitanala Colliery Workers' Union, Sitanala Colliery, P.O. Sitanala, district Dhanbad.	373	24th July, 1949	I.N.T.U.C.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
32	Khas Kusunda Colliery Labour Union, P. O. Khas Kusunda, district Dhanbad.	374	3rd August, 1949 ..	Not affiliated.
33	Koyala Mazdoor Panchayat, Jharia, district Dhanbad.	415	30th December, 1950	H.M.S.
34	Shanai Brothers Workers' Union, Katrasgarh, district Dhanbad.	417	6th November, 1950	Not affiliated.
35	Badjana Colliery Mazdoor Union, New and West Badjana Collieries, P. O. Nirsa-chatti, district Dhanbad.	421	11th February, 1950	Ditto.
36	The Association of Indian Mine Surveyors, at and P.O. Dhanbad.	442	11th May, 1950 ..	Ditto.
37	Dighpatiya Junior Raj Nudkhurkee Collieries Workers' Union, P. O. Nudkhurkee, district Dhanbad.	450	11th July, 1950 ..	Ditto.
38	Mandra Collieries Labour Union, P. O. Nawagarh, district Dhanbad.	455	13th August, 1950 ..	Ditto.
39	Karamohari Sangh, Karam-pura, P. O. Nirsa-chatti, district Dhanbad.	475	4th November, 1950	I.N.T.U.C.
40	Colliery Mazdoor Sangh, Opposite State Bank of India, Katras Road (Dhanbad).	491	7th June, 1951 ..	I.N.T.U.C.
41	Jharia Khas Colliery Workers' Union, Indian Mine Works Federation, at and P. O. Dhanbad, district Dhanbad.	499	27th March, 1951 ..	A.I.T.U.C.
42	Agardih Colliery Labour Union, P. O. Katrasgarh, district Dhanbad.	522	30th August, 1951 ..	Not affiliated.
43	Jairamdih Colliery Mazdoor Union, P. O. Nudkhurkee, district Dhanbad.	530	26th September, 1951	Ditto.
44	Damodar Rope Way Labour Union, P. O. Nudkhurkee, district Dhanbad.	556	30th April, 1952 ..	I.N.T.U.C.
45	Fertiliser Factory Workers' Union, L-I 586/587 Sharpura, district Dhanbad.	591	31st March, 1953 ..	I.N.T.U.C.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
46	Loyabad Labour Union, P. O. Bansjora, district Dhanbad.	595	10th April, 1953	.. A.I.T.U.C.
47	Mahalbani Colliery Workers' Union, P. O. Bhowra, Dhanbad.	601	4th May, 1953	.. A.I.T.U.C.
48	Bagaigi Kujma Workers' Union, South Kujma Colliery, P. O. Jharra (Dhanbad).	604	19th May, 1953	.. Not affiliated.
49	Dhanbad Municipal Labour Union, Refugee Market, district Dhanbad.	605	23rd May, 1953	.. A.I.T.U.C.
50	Damodar Valley Corporation Karamchari Sangh, Panchet Hill, P. O. Panchet (Dhanbad).	612	2nd July, 1953	.. I.N.T.U.C.
51	Ekra Engineering Workers Union, P. O. Bansjora, district Dhanbad.	630	29th August, 1953	.. I.N.T.U.C.
52	Bihar Coal Miners Union, Digwadih, P. O. Jealgora, district Dhanbad.	637	25th September, 1953	U.T.U.C.
53	Tata Colliery Workers' Union, Digwadih P. O. Jealgora, district Dhanbad.	638	27th August, 1953	.. U.T.U.C.
54	Tisco Accounts Branch Employees' Union, Digwadih, P. O. Jealgora, district Dhanbad.	651	2nd February, 1954	I.N.T.U.C.
55	Khas Colliery Workers' Union, P. O. Sijua, district Dhanbad.	669	14th May, 1954	.. A.I.T.U.C.
56	Surendra East Loyabad Colliery Labour Union, P. O. Kusunda, district Dhanbad.	671	21st May, 1954	.. Not affiliated.
57	Central Alkusa (Goundi) Colliery Workers' Union, Kandwadih Bazar, P.O. Kusunda, district Dhanbad.	648	19th September, 1954	A.I.T.U.C.
58	Bararwe Coke Plant Workers' Union, Opposite Imperial Bank, district Dhanbad.	688	19th September, 1954	Not affiliated.
59	Workers' Union, D. V. C. Maithan, Dhanbad.	694	3rd November, 1954	Ditto.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
60	Central Kenduadih Colliery Labour Union, Central Kenduadih Colliery, P. O. Nawagarh, district Dhanbad.	696	27th November, 1954	Not affiliated.
61	Central Kooridih Labour Union, Central Kooridih Colliery, P. O. Katrasgarh, district Dhanbad.	697	3rd December, 1954	Ditto.
62	Cement Factory Workers' Union, C/o Factory Workers' Union, L-586, P. O. Saharpura, Sindri, district Dhanbad.	710	24th January, 1955	Ditto.
63	West Chandore Collieries Workers' Union, P. O. Sijua, E. Rly., Dhanbad.	711	28th January, 1955	Ditto.
64	Shusha Sramik Sangh, Jharra (Dhanbad).	716	31st May, 1955 ..	I.N.T.U.C.
65	Dhanbad Subdivisional Karamchari Sangh, P. B. No. 51, Jharra, district Dhanbad.	731	31st May, 1955 ..	A.I.T.U.C.
66	Dhanbad District Press Karamchari Sangh, Near Bus Stand No. 4, at and P. O. Jharra, district Dhanbad.	769	14th February, 1956	A.I.T.U.C.
67	Albion Colliery Workers' Union, Albion Colliery, P. O. Karnatand (Dhanbad).	770	6th March, 1956 ..	Not affiliated.
68	Bokaro Jharra Colliery Workers' Union, P. O. Karnatand, Dhanbad.	771	6th March, 1956 ..	Ditto.
69	Mugma Mazdoor Union, Mugma, P. O. Mugma, district Dhanbad.	772	17th March 1956 ..	I.N.T.U.C.
70	Koshalpur Colliery Workers' Union, Guhiband, P. O. Katrasgarh (Dhanbad).	788	11th August 1956 ..	Not affiliated.
71	Mines Electrical Supervisors' Association, Son's Residence, at and P. O. Katrasgarh, district Dhanbad.	797	30th August 1956	Ditto.
72	Patent Store Workers' Union, Loyabad Power House, P.O. Bansjora, district Dhanbad.	798	1st September, 1956	Ditto.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
73	Pure Kustore Colliery Workers' Union, Pure Kustore Colliery, P. O. Kusunda, district Dhanbad.	804	4th October, 1956 ..	Not affiliated.
74	Liberty Colliery Workers' Union, Liberty Colliery, P.O. Dhansar (Dhanbad).	805	5th October, 1956 ..	Ditto.
75	Jharia Water Board Workers' Union, Jamadoba, P. O. Dhansar (Dhanbad).	810	29th November, 1956	Ditto.
76	Sulunga Colliery Workers' Union, P. O. Khas Jungarh, district Dhanbad.	811	29th November, 1956	Ditto.
77	Engineering and Foundry Workers' Union, Badjua, P.O. Nirsachatti (Dhanbad),	812	29th November, 1956	Ditto.
78	Bera Colliery Workers' Union, Bera Colliery Dhansar, P.O. Dhansar (Dhanbad).	813	29th November, 1956	Ditto.
79	Shree Ram Krishna Engineering Works Labour Union, Jamadoba, P. O. Jealgora (Dhanbad).	829	17th June, 1957 ..	Ditto.
80	Mines Labour Welfare Organisation Workers' Union, Dhanbad, C/o Indian National Mines Workers' Federation, district Dhanbad.	833	25th September, 1957	Ditto.
81	Bihar Koyala Mazdoor Sabha, Dhanbad, Indian National Mine Workers' Federation, Dhanbad.	837	10th October, 1957	A.I.T.U.C.
82	Karanpura Workers' Union, Karanpura P. O. Nirsachatti, district Dhanbad.	851	18th April, 1958 ..	Not affiliated.
83	Congress Mazdoor Sangh, Baghmara, P. O. Mohuda, district Dhanbad.	863	31st August, 1958 ..	Ditto.
84	Godhur Mazdoor Sangh, West Godhur Colliery, P.O. Kusunda (Dhanbad).	877	12th December, 1958	Ditto.
85	Chandoro Mazdoor Sangh, Pure Chandore Colliery, P.O. Sijua, district Dhanbad.	878	12th December, 1958	Ditto.
86	Adarsh Biri Mazdoor Sangh, P. O. Jharin, district Dhanbad.	879	12th December, 1958	Ditto.

Serial no.	Name of the union.	Registration no.	Date of registration.	Affiliation with central organisation.
87	Nichitpur Colliery Workers' Union, Nichitpur Colliery, P. O. Bansjora, district Dhanbad.	902	30th May, 1959	.. Not affiliated.
88	Karmatand Colliery Workers' Union, Karmatand Colliery, P. O. Karmatand, district Dhanbad.	903	30th May, 1959	.. Ditto.
89	Brook Bond (Dhanbad Branch) Employees' Union, C/o Sri Ramnautar Mistry, Manakand, district Dhanbad.	905	2nd June, 1959	.. Ditto.
90	Mines Mazdoor Union, Bihar, Sijua, P. O. Sijua, Dhanbad.	912	14th September, 1959	H.M.S.
91	Dhanbad Paribahan Karamchari Sangh, Dari Mahalla, district Dhanbad. ²	934	11th January, 1960	U.T.U.C.
92	Dhanbad District Firebrick and Ceramic Workers' Union, P. O. Chirkunda (Dhanbad).	940	20th February, 1960	A.I.T.U.C.
93	Dhanbad Local Bodies Karamchari Sangh, Dari Mahalla, Dhanbad Bazar (Dhanbad).	946	6th March, 1960	.. U.T.U.C.
94	Refractory General Workers' Union, Kaloo Bathan, P. O. Karanpura (Dhanbad).	964	25th June, 1960	.. Not affiliated.
95	Coke Plant Mazdoor Sewak Sangh, Bhowra, P. O. Bhowra, district Dhanbad.	994	27th December, 1960	Ditto.

INDIAN MINING FEDERATION.*

Originally Indian Mining Association was the only organisation to look after the coal mining industry in India. In subsequent years it was found that the interests of the big European-managed collieries often clashed with those of the medium and small size collieries managed mostly by Indians. The necessity of an organisation to look after the interests of the latter class of collieries was therefore strongly felt. Indian Mining Federation was thus brought into being through the united efforts of several leading Indian colliery-owners headed by late Rai Bahadur A. C. Banerjee, C.I.E., late N. C. Sarkar, late M. N. Mukherjee and others. The Federation was established in 1913 and registered under the Societies Registration Act XXI of 1960.

The affairs of the Federation are managed by a duly elected Executive Committee consisting of 20 elected and six co-opted

* Contributed by the I. M. F. (P. O. R. C.).

members. The Committee is reconstituted every year by fresh election. The Committee has a Chairman and a Vice-Chairman, who are also elected every year.

The members of the Federation are scattered over almost all the coal-producing areas in India. For the convenience of the local member-collieries, the Federation has two branch executives, and six coalfield committees situated at the various coalfield areas of the country.

The office of the Indian Mining Federation is housed at its registered address 135, Canning Street, Calcutta, where meetings are held by the Committee at regular intervals to consider communications on various subjects concerning the coal mining industry received from Governments both State and Central, Railways, Railway Board, and other establishments.

The Federation is represented on the following statutory and public bodies and committees through representatives sent by it at the time of reconstitution of the bodies or committees:—

- (1) Asansol Mines Board of Health.
- (2) Advisory Committee on Stowing.
- (3) Advisory Committee for the Coal Survey Stations under the Central Fuel Research Committee:—
 - (i) Raniganj Coal Survey Station.
 - (ii) Jharia Coal Survey Station.
 - (iii) Bokaro-Ramgarh-Karanpura Coal Survey Station.
 - (iv) C. I. Coal Survey Station, Bilaspur.
 - (v) Nagpur Coal Survey Station.
 - (vi) Assam Coal Survey Station, Jorhat.
- (4) All India Organization of Industrial Employers.
- (5) Asansol Leprosy Relief Association—Central Leprosy Board.
- (6) Bihar Standing Labour Advisory Board.
- (7) Board of Examiners under the Boiler Attendants' Rules.
- (8) Bihar Coalfield Sub-Committee.
- (9) Coal Distribution Advisory Committee.
- (10) Coal Production Advisory Committee.
- (11) Coal Transport Advisory Committee.
- (12) Coal Mines Labour Welfare Fund Advisory Committee, Dhanbad.
- (13) Coal Mines Provident Fund-Board of Trustees.
- (14) Coalfield Recruiting Organization.

- (15) Committee on Safety Education and Propaganda.
- (16) Committee to investigate danger of subsidence in Bihar Mining Area.
- (17) Central Boilers Board.
- (18) Central Hostel Committee for Gorakhpur and other labour.
- (19) Committee to investigate Pilot and Depot Capacities in the Bengal and Bihar Coalfields—Requirements in Third Five-Year Plan.
- (20) Committee to investigate Pilot and Capacities in the Central India and Korba Coalfields—Requirements in Third Five-Year Plan.
- (21) Coal Mines Labour Housing Board.
- (22) Committee to revise specifications of grading of coking coal.
- (23) Divisional Railway Users' Consultative Committee of the Eastern Railway, Asansol.
- (24) Dhanbad District Board.
- (25) Employment Advisory Committee attached to the Sub-Regional Employment Exchange, Asansol.
- (26) Employment Advisory Committee, Dhanbad.
- (27) Employment Advisory Committee for the Pilot Employment Exchange, Raniganj.
- (28) General Committee of the Asansol Health and Baby Welfare Society.
- (29) Hospital Committee for the Central Hospital, Asansol.
- (30) Hazaribagh (Bokaro-Ramgarh-Karanpura and Giridih) Coalfield Sub-Committee.
- (31) Indian Standard Institution.
 - (a) The Coal Sampling Sub-Committee CDC 14 : 1.
 - (b) Standard Sizes (for marketing Sub-Committee), CDC 14 : 3.
 - (c) Terminology and Classification of Coal Sub-Committee CDC 14 : 4.
 - (d) Soft Coke Sub-Committee.
- (32) Informal Coal Allotment Advisory Committee.
- (33) Import Licence Screening Committee.
- (34) Jharia Mines Board of Health.
- (35) Jharia Water Board.
- (36) Jharia Telephone Advisory Committee.

- (37) Joint Purchase Advisory Committee for the supply of Uniforms and Footwear to the Colliery Workers.
- (38) Mining Board for West Bengal.
- (39) Mining Education Advisory Board for West Bengal.
- (40) Mineral Advisory Board.
- (41) Manufacture of Mining Machinery for the Coal Industry—Sub-Committee of the Production and Preparation Committee.
- (42) Mineral Advisory Council, Bihar.
- (43) National Mines Safety Council.
- (44) Orissa Coalfield Sub-Committee.
- (45) Project Report Examination Committee.
 - (i) Technical Sub-Committee—Jharia and Mugma Coalfields; Raniganj Coalfield; Outlying Coalfields.
 - (ii) Finance Sub-Committee.
- (46) Port Import Advisory Committee.
- (47) Railways and Collieries Advisory Board, Dhanbad.
- (48) Rescue Stations Committee.
- (49) Railway Rates Tribunal.
- (50) South Eastern Railway Regional Railway Users' Consultative Committee, Garden Reach.
- (51) Sub-Committee of the Mineral Advisory Board on Mineral Production.
- (52) Sub-Committee to examine Training Schemes for Coal Mine Entrants.
- (53) Standing Safety Advisory Committee.
- (54) Standing Committee on Raw Materials for the Steel Industry.
- (55) Special Assistance Committee Re: Subsidy for deep, gassy and difficult mines.
- (56) Sub-Committee constituted to visit the Individual Steel Plants for examining the Coal Sampling Facilities.
- (57) West Bengal Coalfield Sub-Committee.

Now that the country is being industrialized great stress is being laid on production of more coal. But working of collieries is hampered by various hindrances, principal amongst which are the following:—

- (1) Lack of adequate transport arrangement.
- (2) Want of necessary machinery and equipment which cannot be imported owing to foreign exchange difficulties.

- (3) Shortage of Explosives.
- (4) Power Shortage.
- (5) Labour unrest in coalfield areas.

The Federation is actively engaged in trying to solve the various problems confronting the industry out of the above sources by holding meetings and sending representations to the various quarters.

The main functions of the Indian Mining Federation are to stimulate, develop and further the interests of coal mining industry.

INDIAN COLLIERY OWNERS' ASSOCIATION.

This association was established in 1933 under section 26 of the Indian Companies Act, 1913. The office is located at Dhanbad.

The affairs of the Association are managed by a duly elected Executive Committee consisting of 15 elected and four co-opted members. The Committee is reconstituted every year by fresh election. The Committee is headed by a Chairman, a Vice-Chairman and an Honorary Secretary who are also elected every year.

The members of the Association are scattered over almost all the coal-producing areas in India. For the convenience of the local member-collieries, the Association has seven zonal committees situated at the various coalfield areas of the country, namely, Tisra zone, Kenduadih zone, Dhansar-Jharia zone, Hazaribagh zone, Mugma zone, Katras zone and Raniganj zone.

The Association is represented on the following public bodies and committees through representatives sent by it at the time of re-constitution of the bodies or committees:—

- (1) All India Organisation of Industrial Employers, New Delhi.
- (2) Advisory Committee for the Regional Directorate of Resettlement and Employment of Bihar and Orissa.
- (3) Anti-Corruption Committee.
- (4) All India Council of Labour Welfare, Madras.
- (5) Board of Trustees and Executives of Coal Mines Provident Fund, Dhanbad.
- (6) Bihar Council (Standing) Labour Advisory Board, Patna.
- (7) Bihar Chamber of Commerce, Patna.
- (8) Board of Examiners for Mine Managers' Certificate.
- (9) Bihar Government's Advisory Council for Development of Industries in Bihar.
- (10) Coal Mines Rescue Station.
- (11) Committee for the Physical Survey in the Raniganj Coal-field.

- (12) Committee for the Physical Survey in the Jharia Coal-field.
- (13) Advisory Committee for Coal Survey Centres:—
 - (a) Jharia Coal Survey Station.
 - (b) Raniganj Coal Survey Station.
- (14) Central Boilers Board.
- (15) Coal Transport Advisory Committee.
- (16) Coal Distribution Advisory Committee.
- (17) Coal Mines Labour Welfare Fund Advisory Committee.
- (18) Committee to investigate the possibility of stowing, etc., at the Jamabad Kajora Area under the Coal Board.
- (19) Advisory Committee on Stowing.
- (20) Coalfield Recruiting Organisation.
- (21) Central Hospital Committee for the Central Hospital, Asansol, Regional Hospital, Searsole Rajbari and T.B. Clinic, Searsole Rajbari.
- (22) Central Hostel Committee Gorakhpur Labour Organisation.
- (23) Constitution of Hospital Committee for Regional Hospital, Phusro.
- (24) Divisional Railway Users' Consultative Committee on the Eastern Railway.
- (25) District Board, Dhanbad.
- (26) Dhanbad District Leprosy Relief Association.
- (27) Engineering Divisional Council of the Indian Standards Institution.
- (28) Panel of Soft Coke, C.D.C. 15 : 5 : 3 of the Indian Standards Institution.
- (29) Composition of Standard size for marketing Sub-Committee.
- (30) Reconstitution of Terminology and Classification of Coal Sub-Committee.
- (31) Indian Panel of Railway.
- (32) Jharia Mines Board of Health.
- (33) Jharia Water Board.
- (34) Trade Panel of the Railway Rates Tribunal.
- (35) Zonal Railway Users' Consultative Committee of the—
 - (i) Eastern Railway.
 - (ii) South Eastern Railway.
- (36) N.E.F. Railway's Western Regional Railway Users' Consultative Committee.

- (37) Regional Railway Users' Consultative Committee of the South Eastern Railway.
- (38) Jharia and Mugma Coalfield Sub-Committee of the Government of Bihar.
- (39) Pinjrapole Society, Calcutta.
- (40) Coal Production Advisory Committee.
- (41) Reconstituted Telephone Advisory Committees at (i) Patna, (ii) Ranchi and (iii) Jharia.
- (42) Employment Advisory Committee of the Pilot Employment Exchange, Raniganj.
- (43) Sub-Committee, on Foreign Trade with Pakistan and Europe as F.I.C.C.I.'s representative.
- (44) Sub-Regional Employment Advisory Committee.
- (45) Women's College Executive Committee, Dhanbad.
- (46) Mining Education Advisory Board for West Bengal.
- (47) Mining Board.
- (48) Committee on Safety Education and Propaganda.
- (49) Standing Safety Advisory Committee (formed by the Chief Inspector of Mines).
- (50) National Railway Users' Consultative Committee.
- (51) Sub-Committee (formed by the Coal Board).
- (52) Central Purchase Committee for Approval of a panel of suppliers sample and price of foot-wear, etc.
- (53) Eastern Regional Committee of the All India Organisation of Industrial Employers, New Delhi.
- (54) Sub-Committee for Assessment of Retirement of Technical Personnel during the Fourth and Fifth Plan period constituted by the production and preparation Committee (on behalf of the Joint Working Committee).
- (55) Sub-Committee of the Coal Board.
- (56) Port Import Advisory Committee.
- (57) National Mine Safety Council.

The total strength of membership of this Association on the 31st May, 1962 was 204.

The objects for which the Association is established are—

- (a) To promote and protect the coal mining industry, trade and commerce of India.
- (b) To aid and stimulate the development of mining industries in India and to protect and further the commercial interest of all persons engaged therein.

- (c) To watch over and protect the General Mining Industry of India or any part thereof and the interest of persons engaged in mining trade, commerce or industry in India.
- (d) To promote the study of all branches of mining, geology, metallurgy and engineering in India, with a view to disseminate the information obtained for facilitating the scientific and economic development of the mineral industries of India.
- (e) To promote or oppose legislative and other measures affecting mining industry, trade and commerce.
- (f) To adjust controversies between members of the Association.
- (g) To establish just and equitable principles of trade.
- (h) To maintain uniformity in rules, regulations and usages of trade.
- (i) To make, accept, endorse, execute, issue, negotiate promissory notes, bills of exchange, debentures and other negotiable instruments.
- (j) To raise money by subscriptions or otherwise and to grant any rights and privileges to members or subscribers.
- (k) To do all such other things as may be conducive to the extension of trade, commerce, or manufactures or incidental to the attainments of the above objects or any of them.

Every member of the Association undertakes to contribute to the assets of the Association, in the event of the same being wound up during the time that he is a member, or within one year afterwards for payments of the debts and liabilities of the Association contracted before the time at which he ceases to be a member and costs, charges and expenses of winding up the same, and for the adjustment of the rights of the contributories amongst themselves, such amount as may be required, not exceeding Rs. 25.

INDIAN MINING ASSOCIATION.

Indian Mining Association was established in 1892. The office is located at Calcutta but their main work is in Dhanbad area. The affairs of the Association are managed by a duly elected Executive Committee consisting of ten elected members. The first election of office-bearers was held on 16th May, 1892. Mr. C. W. Gray was elected the first Chairman of the Association. The Committee is re-constituted every year by fresh election. The Committee is headed by a Chairman and a Vice-Chairman, who are also elected every year.

Besides, there are sub-committees, viz., Labour Sub-Committee, Import Sub-Committee, Finance Sub-Committee, Public Relations Sub-Committee and Minerals other than Coal Sub-Committee.

The members of the Association are scattered over almost all the coal-producing areas in India. The Association is represented on the following statutory and public bodies and committees through representatives sent by it at the time of reconstitution of the bodies or committees:—

- (1) Advisory Committee on Stowing.
- (2) Advisory Committee for the Pilot Employment Exchange at Raniganj.
- (3) All India Council of Labour and Welfare Officers.
- (4) Asansol Mines Board of Health.
- (5) The Bengal Chamber of Commerce and Industry.
- (6) Bihar Central (Standing) Labour Advisory Board.
- (7) Bihar Employment Advisory Committee.
- (8) Bihar State Industrial Development Council.
- (9) Board of Industries, Bihar.
- (10) Board of Mining Examinations.
- (11) Calcutta School of Tropical Medicine, Governing Body.
- (12) Central Boilers Board.
- (13) Central Hospital, Dhanbad.
- (14) Central Fuel Research Institute for—
 - (a) Assam Coal Survey Station.
 - (b) Bokaro-Ramgarh-Karanpura Coal Survey Station.
 - (c) Central India Coal Survey Station.
 - (d) Jharia Coal Survey Station.
 - (e) Raniganj Coal Survey Station.
 - (f) Hyderabad Coal Survey Station.
- (15) Coal Advisory Committee.
- (16) Coal Mines Welfare Fund Advisory Committee, Sub-Committee and Standing Committee.
- (17) Coal Mines Labour Welfare Fund Advisory Committee : West Bengal Coalfield Sub-Committee.
- (18) Coal Mines Labour Welfare Fund Advisory Committee : Bihar Coalfield Sub-Committee.
- (19) Coal Mines Labour Welfare Fund Advisory Committee—Hazariibagh Coalfield Sub-Committee.
- (20) Coal Mines Labour Housing Board.
- (21) Coal Mines Provident Fund : Board of Trustees.

- (22) Coal Transport Advisory Committee.
- (23) Committee to discuss matters relating to the allotment of wagons.
- (24) Committee to investigate the danger of subsidence in Bihar Coal Mining Areas.
- (25) Committee on Safety Education and Propaganda.
- (26) Dhanbad and Coalfields Cemetery Committee.
- (27) Dhanbad and District Leprosy Relief Association.
- (28) Dhanbad Local Board.
- (29) Employment Advisory Committee, Dhanbad.
- (30) Sub-Regional Employment Advisory Committee, Dhanbad.
- (31) Employers' Federation of India : Eastern Regional Committee.
- (32) Fuel Research Committee of the Board of Scientific and Industrial Research.
- (33) Gorakhpur Labour Organisation : Advisory Committee, Dhanbad.
- (34) Governing Council of the Indian School of Mines and Applied Geology.
- (35) Hazaribagh District Board.
- (36) Hazaribagh Mines Board.
- (37) Indian Standards Institution.
- (38) Jharia Mines Board of Health.
- (39) Jharia Water Board.
- (40) Manbhum District Board.
- (41) Mineral Advisory Board.
- (42) Mineral Advisory Council for the Eastern Region.
- (43) Mineral Advisory Board : Sub-Committee on Mineral Production.
- (44) Mining Board for West Bengal.
- (45) Mining Board for All Mines in Bihar.
- (46) Mining Education Advisory Board for West Bengal.
- (47) Posts and Telegraphs Advisory Committee for Bihar.
- (48) Progress Review Committee.
- (49) Railways and Collieries Advisory Board.
- (50) Eastern Railway Users' Consultative Committee, Calcutta.
- (51) Eastern Railway, Divisional Railway Users' Consultative Committee, Howrah.
- (52) Eastern Railway, Divisional Railway Users' Consultative Committee, Sealdah.

- (53) Rescue Stations Committee.
- (54) Ross Institute of Tropical Hygiene, India Branch, Committee of Control.
- (55) Standing Committee, Iron and Steel Advisory Council.
- (56) Standing Coalfields Committee.
- (57) Standing Coalfields Committee : Joint Honorary Secretaries.
- (58) Standing Safety Advisory Committee.
- (59) Sub-Committee appointed by Government to examine the Training Scheme for New Entrants to Coal Mines.
- (60) Telephone Advisory Committee, Asansol.
- (61) Workers' Education Training Centre at Dhanbad.

The objects of the Association is to protect, by every legitimate means, the interests of those engaged in developing the mining industries of India, to foster those industries, to provide a ready means of arbitration for the settlement of disputes between mining proprietors, and to take part in such discussions affecting land as may have a bearing upon mines, their development, or working, and, for this purpose, to enter into communication with the Government or other public bodies.

All persons or companies engaged in conducting mining enterprises shall be eligible to be members of the Association.

After the formation of the Association, members are elected by the General Committee of the Association after being proposed by one member and seconded by another. Members have to pay a subscription of Rs. 20 per mensem, in advance.

TRANSPORT OF COAL.

Regarding "Transport of Coal" the views of Indian Mining Association and Indian Mining Federation are summarised below. These discussions have a permanent value.

Shortage of wagons and slow movement of coal from the pit-heads is a serious problem and affects industrial production in general.

The concentration of the coal production in Bengal and Bihar coalfields poses a serious problem of transport because coal has to move to consumers distributed all over the country. Although the seriousness of the problem can be mitigated to some extent by increasing production in the outlying coalfields, this cannot offer a complete solution. In view of the fact that the superior grades of coal are not found outside Bengal and Bihar coalfields, the large increase in the coal production programme during the Third Plan will mean increased pressure on the railways for moving coal to distant consumers.

The development programme of the Railways for the movement of coal in the Third Five-Year Plan has been formulated on the basis of the coal traffic reaching a figure of about 90 million tons in 1965-66, i.e., the last year of the Third Plan, as against 49.5 million tons fixed for 1960-61, the final year of the Second Plan. This estimate of coal movement at 90 million tons corresponds to a production target of 97 million tons, the difference of 7 million tons representing the consumption at the collieries and the anticipated movement of coal by means other than rail transport. The volume of coal traffic is thus expected to increase over that of 1960-61 by 40.5 million tons, i.e., by about 82 per cent. In regard to coal, however, calculations of transport requirement have been made on the basis of the estimated production and the probable location of the production units.

While the target of coal production has been stepped up from 60 million tons to 97 million tons during the Third Five-Year Plan period, there has to be a commensurate increase in the capacity of rail transport. The phased requirements of coal transport by rail during the Third Five-Year Plan which has been assessed as follows by the Ministry of Steel, Mines and Fuel would justify the doubt if the Railways will be able to cope. The phased programme is as follows:—

Year.				Daily average number of wagons necessary.
1961-62	..	..	..	7,183
1962-63	..	..	..	8,561
1963-64	..	..	..	9,610
1964-65	..	..	..	11,502
1965-66	..	..	..	12,339

Although the daily average number of wagons necessary for coal loading has been assessed in terms of the above table as 7,183 wagons for the year 1961-62, the average loading in Bengal and Bihar coal-fields for the year 1961, it may be noted, was only 4,768 wagons, the highest figure, reached in the month of August, being 5,101 wagons. The coal production and consumption for the Third Plan period will never be attained unless the transport improves very considerably.

How bad the wagon supply position was during 1961 under review will be evident from the figure of total despatches of coal of 50.3 million tons as against a production of 56.1 million tons.

It is true that in coal production the limiting factor is always the availability of transport; if the target of coal production is fixed at 97 million tons for the Third Plan period and 200 million tons for the Fourth Plan period there will have to be adequate arrangements for a corresponding increase in the capacity of rail transport.

The matter was referred to the Planning Commission in November, 1961 and it was pointed out that during the period January to March, 1961 the rate of coal production was 22 per cent higher to the production during the same period of the previous year but the availability of transport had increased by only 11 per cent.

At a meeting of the Coal Production Advisory Committee in December, 1961 the industry was informed that the Railway Board had given an indication of the availability of wagons for coal loading in the different coalfields during 1962 as follows:—

West Bengal and Bihar area (in wagons per day)—

For Steel Plants—1,400.

Dugda Washery—300.

For other consumers—3,796 (including 150 wagons for Jamadoba Washery).

At the meeting with Government officials in January, 1962 it was pointed out that 6,925 wagons daily would provide only for movement by rail of 55 million tons of coal. This estimate was accepted as correct by a representation of the Railway Board. According to this it was calculated that transport availability in 1962 would cater for approximately 59 million tons of coal production as against the planned production target of 68 million tons for 1962, involving a transport shortfall of approximately 9 million tons. It was also a problem if the Railways could maintain a daily average supply of 6,925 wagons throughout 1962, particularly since wagon offerings were in fact well below this level. The Government, however, advised the representative of the industries not to take a pessimistic view and not to cut down their production.

Movement of Coal by Road.

At a meeting of the Coal Transport Advisory Committee held on 27th February, 1961 the solution that road permits should be issued freely to alleviate to some extent the distress of the collieries producing lower grade coals in clearing accumulating stocks at their pit-heads was discussed. It was at first considered by the Coal Controller that free movement of coal could not be permitted because of the difficulties in collecting various cesses payable by collieries and on which many statutory bodies subsisted.

On subsequent representations made by the industry in this regard, the coupon system came into effect from 24th July, 1961 throughout India except Assam and Andhra Pradesh whose coal has not been graded.

It was decided that collieries in which coal of grade II and lower grades of coal are raised will be allowed to despatch such coal to the consumers on furnishing necessary particulars as prescribed in the

coupons. Road permits or road passes will not be required henceforth for despatching coal which will be allowed to move under the coupon system as the coupon itself will serve the purposes of both. It was held that the collieries will be allowed to despatch coal by road or river up to the permissible limit fixed for it. This would be based on—

- (a) The colliery's average monthly output for three months for any quarter of the year as decided by the Coal Controller's organisation will be taken into account along with the month—end stock of the latest period.
- (b) Seventy-five per cent of the average output and 50 per cent of the month-end stock will be treated as monthly average quota which will be the maximum permissible limit.
- (c) Relaxation may be made by the issuing authorities on the merit of individual cases represented to them. The applicant will have to deposit in advance at the local treasury or sub-treasury the cesses and excise duties payable to the Coal Mines Welfare Organisation and the Coal Board at the rates fixed from time to time in the same manner as is being done at present. In addition to this they will deposit Rs. 1.50 nP. as cost of each book containing 100 coupons.

If the driver of any vehicle is found to carry coal without a road pass for coal of grade I and above or a coupon for coal of grade II or below, the police authorities may initiate legal action against him. In other words every vehicle moving coal by means other than rail must possess a road permit (in case of road permit, a road pass will also accompany) or a coupon while transporting coal outside the colliery area.

All the collieries despatching coal under coupon must submit a monthly statement to the issuing authority by the 10th of the following month in a prescribed *pro forma*.

The issuing officers, in the event of being satisfied that any colliery has misused coupons or is not in a position to despatch coal, may either refuse to issue coupon or direct the colliery to return the unused coupons to the issuing officers and retain them till satisfied that the colliery has attained the capacity to resume normal coal despatches.

The following officers have been authorised to issue coupons for road movement:—

- (i) Coal Superintendent, Dhanbad.
- (ii) Assistant Coal Superintendent, Parasia.
- (iii) Railway Allotment Officer, Bilaspur.
- (iv) Railway Allotment Officer, Khurda Road.

TRADE UNION MOVEMENT IN DHANBAD DISTRICT AND ITS GROWTH.

Trade unionism in proper form was hardly in existence in India before the World War I. The British Government in India began to realise the awakening and consciousness amongst the working classes of India immediately after the cessation of the First World War. The trade union movement in the United Kingdom particularly and other industrially advanced countries of the World generally had by then made sufficient progress and the spirit spread to other areas. Due to the economic consequences of the War and change in the political outlook in the leadership, the working class in India began to realise the necessity of organising themselves. Madras took the lead in this direction and the Madras Textile Labour Union and the Aluminium Labour Union, Madras, and the Workers' Union, Ahmedabad were the first organisation of the workers to be formed in 1917-18. Subsequently, the increased trade union activities led to the formation of the first organisation of workers on all-India basis, namely, the All-India Trade Union Congress, which was formed in 1920 under the Presidentship of Lala Lajpat Rai. It may be noted that all these organisations had no legal status. This lacuna was keenly felt by the labour leader, Sri N. M. Joshi and accordingly he moved a resolution for introduction of trade union legislation in the Indian Assembly in 1921. Indian and European employers who had the vested interest opposed to move vehemently in the beginning, but in spite of their opposition efforts were continued until 1926 when the Trade Unions Act was enacted by the Indian Legislature. Broadly speaking, this Act was framed on the lines of British Trade Unions Act, 1913. As a result of the enactment of the Indian Trade Unions Act, in 1926, the workers' organisations got a legal status and the Trade Unions registered under the said Act secured, briefly speaking, the following rights and privileges:—

- (a) (i) To have a corporate existence;
- (ii) to have perpetual succession and to hold and acquire property both movable and immovable;
- (iii) to contract; and
- (iv) to sue and to be sued in its own name.
- (b) No member of a trade union is liable to prosecution under the law for criminal conspiracy for an act done or agreed to be done in accordance with the lawful object of the trade union.
- (c) No civil suit will lie against a member of a trade union for an act done in furtherance of a trade dispute with which a member of the trade union is concerned on the ground that such action (i) induces any other person to break his contract of employment and/or (ii) interferes with trade, business or employment of any person or disposal of capital or labour by any person.

- (d) No legal proceedings will lie against a registered trade union for any tortuous act done by any agent of a trade union if it be proved that such action was without the knowledge or against the express instruction of the executive of the trade union.
- (e) No provision in any other law will make an agreement made between members of a trade union void even though such agreement is in restraint of business or trade; but such agreement by itself is not enforceable by legal proceedings nor can any damage be claimed or awarded for breach of any such agreement.

The trade union movement continued to flourish thereafter under the leadership of a number of leaders. In 1931 the trade union movement had reached a stage when the British Indian Government felt the necessity of constituting a 'Royal Commission on Labour in India'. The Royal Commission on Labour in India made a thorough study of the problem in the country and suggested a number of important recommendations. The Royal Commission also realised the necessity of the growth of a healthy trade union movement in the country as will be seen in the paragraph quoted:—

"Nor is labour the only party that will benefit from a sound development of trade union movement. While the advantages to be gained from repression are temporary and precarious those that accrue from healthy organisation are lasting. Further, some form of organisation is inevitable, since the need is acute and is bound to evoke a response. If that response does not take the form of a properly organised trade union movement, it may assume dangerous form. Some employers have already suffered severely from the lack of responsible trade unions of their workers, and this type of suffering extends to the community as a whole."

A series of legislations were subsequently enacted to give effect to most of its recommendations.

The trade union movement in India made a great headway on an all-India basis beginning from Ahmedabad and Bombay.

The following workers' organisations on an all-India basis were formed and started functioning:—

- (a) *The All-India Trade Union Federation.*—This name was later on changed to 'National Trade Union Federation'. This was subsequently dissolved and merged in All-India Trade Union Congress in 1940.
- (b) *The Red Trade Union Congress.*—In 1935, it was dissolved and merged in All-India Trade Union Congress.
- (c) *The Indian Federation of Labour.*—In 1948, it was merged with the Hind Mazdoor Sabha.

In 1947 when the Congress Party came to power and formed the Government in the States in India, a necessity was felt to constitute an organisation of workers, similarly on the lines of the aforesaid organisations on all-India basis. Accordingly, the 'Indian National Trade Union Congress' was formed in 1947. In this connection, a reference may be made to the objectives laid down in the Congress Election Manifesto in 1946 as enumerated below:—

"In regard to labour, the State shall safeguard the interests of industrial workers and shall secure for them a minimum wage and a decent standard of living, proper housing, hours of work and conditions of labour in conformity, as far as economic conditions in the country permit, with international standards, suitable machinery for the settlement of disputes between employers and workmen, and protection against the economic consequences of old age, sickness, and unemployment. Workers shall have the right to form unions to protect their interest."

Since the first Congress Government came in power, a number of labour enquiry committees were set up to study the working and living conditions of working classes in the country and to make suitable recommendations for their amelioration. Notable among them were the Bombay Textile Labour Enquiry Committee, the Kanpur Labour Enquiry Committee, and the Bihar Labour Enquiry Committee, the last two under the Chairmanship of Dr. Rajendra Prasad. Rege Committee was also formed by the Central Government in 1948. These committees made valuable recommendations for the better working and living conditions of labouring classes in the country.

When independence was achieved in 1947, the Congress Government took keen interest in the matter of amelioration of living and working conditions of the working classes in the country. Steps were taken to form a separate ministry for Labour Department in almost all the States of India. The Congress Government amended certain important labour laws, notably the Industrial Disputes Act, the Indian Factories Act and introduced a number of legislations on labour matters. A number of labour legislations were enacted.

Under the Congress Government, the trade union movement got encouragement and a number of workers' organisations came into existence. The awakening and consciousness of the working classes rapidly came into prominence which attracted the attention of the political parties in India. The rapid growth of the Indian National Trade Union Congress with the patronage of the Indian National Congress was a marked feature after 1947. The trade union movement in the recent years has reached its peak and the workers' organisations functioning on an all-India basis are invited to send representatives of workers to represent their organisations in International Labour Conferences and other committees convened under the auspices of the International Labour Organisation. With the growth

of working classes, the right of workers to organise and bargain collectively attracted the attention of all those who are interested in cordial labour management relationship. The International Labour Conference has also not overlooked this aspect of the growth of trade unionism on these lines.

The provision regarding right to join organisations was inserted in the Indian Trade Unions Act, 1926. As regards the other point, the practice of collective bargaining has developed in majority of industries in India and the representative unions successfully attempt at collective bargaining, at the first instance, without the intervention of Government conciliation machinery.

TRADE UNION MOVEMENT IN BIHAR.

The trade union movement in Bihar was officially recognised by the State Government in 1947 when a Board, namely, the Bihar Central (Standing) Labour Advisory Board consisting of equal number of representatives of employers and employees and some selected representatives of Government under the Chairmanship of the Minister for Labour was set up on a tripartite basis. This was constituted with a view to enable the employers and employees to associate with the work of labour administration and labour legislations, and to advise the State Government on labour matters and suggest ways and means to maintain industrial peace in the State.

The trade union movement in Bihar continued to grow under the different political parties working in the labour field. Majority of the organisations of workers were and are still divided into and affiliated to different political groups, namely, the I.N.T.U.C., the U.T.U.C., Hind Mazdoor Sabha, the A.I.T.U.C. Branches of these organisations, namely, I.N.T.U.C., Bihar Branch K.M.P. (Hind Mazdoor Sabha), A.I.T.U.C., Bihar Branch, etc., and independent organisations like Hindustan Khan Mazdoor Sangh, etc., are functioning in Bihar. A number of unions have grown both in the coalfields and in other industries. The character of leadership of some of these organisations, due to a variety of reasons, has taken a political shape in their important activities. Group rivalries, and vested interest of particular parties and their leaders are now more in prominence. Generally speaking the coalfield has been the hot bed of troubles in the recent years due to political pressure and a plethora of strikes was the outcome of their activities in majority of these cases. These strikes were in some cases followed by violence, intimidation, picketing, assaults and other subversive activities. Recognition of trade unions was also at times the main feature of demands of these organisations. Of course, the right to recognition of representative unions has been accepted by most of the industrially advanced countries, but unfortunately there is no statutory provision in existence in India. The recognition of a union cannot constitute an industrial dispute under the existing Industrial Disputes Act, 1947. The Bihar Labour Advisory Board realising the gravity of the situation arising out of

such demand (recognition of union), formulated a set of rules under which the rival union can claim to be recognised. It also lays down the procedure to deal with rival unions functioning in the same industry. It would appear from the trade union movement in Bihar that exploitation of labour by some vested interests rapidly came into prominence in the recent years. This has also resulted in multiplicity of trade unions in the same industry which is bound to bring ruinous effect to the trade union movement in Bihar including Dhanbad district. Due to this and other factors the workers' organisations are gradually becoming weakened and consequently their bargaining power is likely to be diminished considerably.

In 1947, the Central Government amended the Indian Trade Unions Act, 1926, by incorporating provisions of compulsory recognition and declaring certain practices by employers and employees as 'unfair labour practice' punishable under the amended Act. This amended Act was not enforced with the result that these two important provisions could not be brought into effect. There is no provision whatsoever for these two points in the existing Trade Unions Act. Therefore, the disputes regarding 'recognition of unions and unfair labour practices' both on the part of employers and employees cannot be effectively settled without resorting to Tribunal in the later case. Again, the Bihar Labour Advisory Board constituted a committee, namely, 'Standing Committee' (Trade Unions), consisting of the representatives of workers' organisations of different affiliations to devise ways and means for the smooth running of the trade union movement in the State of Bihar. In recent years, certain unions resorted to go slow tactics against which there is no provision in the Industrial Disputes Act, 1947. The Bihar Labour Advisory Board made a recommendation on tripartite basis to check go slow tactics and formulated a set of rules to enable the Government conciliation machinery to deal with slow strikes.

It is an established fact that the trade union movement cannot make satisfactory progress, if exploitation of labour is generally resorted to by rival groups of unions. Exploitation of labour by labour leaders having vested interest is a problem although this has been deprecated by a number of leaders.

ROLE OF EMPLOYEES VIS-A-VIS THE TRADE UNION MOVEMENT.

Doubtless, the industrial labour cannot be disassociated from the day-to-day working of an industry. They are, to a large extent, responsible for production and industrial peace in the national interest of the country. As almost all the workers' organisations in Bihar are controlled by outsiders belonging to different political parties, the workers are sometime incited to take hasty action in the matter of redress of their grievances and thereby become stumbling block in the industrial production. They also become sometime instrumental to industrial unrest. The workers in Bihar have,

generally speaking, not become so conscious and literate as to control the working of their organisations without outside help. Trade unionism in Bihar has sprung out due to economic, political and social reasons, and, therefore, it may be difficult for so long as the labour become conscious enough to weed out outside leadership altogether. The worker in Bihar has yet to realise that he is a partner of the joint venture and should choose his leaders wisely.

LABOUR MOVEMENT IN THE COAL INDUSTRY.

The existence of coal deposits in various parts of India particularly, in Raniganj and Jharia Coalfields was known even in pre-historic ages. The names Damodar (fire in the womb), Barakar (big mines) and Kalipahari (black hillocks), etc., indicate this. But coal-mines were first opened in the Raniganj area only about a century ago immediately after the Railway lines were constructed in this side. Later on the industry shifted to Asansol and Jharia Coalfields (including Giridih). During and after the First Great War coal-mines were opened in several other provinces and States also such as Central Province (Madhya Pradesh), Orissa, Assam, Hyderabad, etc. But the Jharia Coalfield on account of its rich deposits of metallurgical coal, became the most important coalfield of India. It is for this that the Mines Department of the Government of India, the School of Mines and some other establishments connected with mining were set up at Dhanbad, the central town of the Jharia Coalfields. The flourishing coal-mining industry naturally attracted thousands of labourers from outside who were well exploited for a mere pittance.

Labour movement in the mining industry was first organised by late Swami Viswanand about the year 1919. He had an unlimited fund of energy and a good organising capacity. He walked from place to place, addressed meeting after meeting and worked incessantly against heavy odds. There were no fast-moving luxurious cars to take him round. He was a great orator and had an attractive personality. He did not, of course, organise a trade union in the proper sense of term, but he did a lot of ground work. He awakened the labour to such an extent that he could collect hundreds and thousands of labourers by his presence. At the same time it must be said that the great National Movement organised by Gandhiji about the same time gave a great impetus to his movement in the coalfields. Next year following formation of the All-India Trade Union Congress by the veteran labour leader Mr. N. M. Joshi and some others, a number of regular trade unions were formed in different parts of the country. One of those was formed at Jamshedpur under the presidentship of Mr. Surendra Nath Haldar, Bar.-at-law and another was formed at Jharia under the presidentship of Mr. Indu Bhushan Sen, Bar.-at-law.

The Second Annual Session of All-India Trade Union Congress was held at Jharia in 1921 on the invitation of Swami Viswanand. Mr. Joseph Baptista, Bar.-at-law of Bombay, presided over the sessions.

Four delegates including late P. C. Bose of Dhanbad had participated in the sessions which was attended by not less than sixty thousand miners and the entire coal industry remained closed for three days. Labour conferences were quite unknown at that time and the very idea of holding this conference frightened the mine-owners. Some of the mine-owners got so panicky that they sent a telegram to the Viceroy asking him not to allow the conference to be held within 200 miles of Bengal and Bihar coalfields. The Viceroy did not, of course, accede to this request of the mine-owners but battalions of infantry and cavalry were deployed to protect the lives and properties of the mine-owners and their superior staff. It has, however, to be mentioned that there was at least one colliery owner, Seth Ranjash Agarwalla who rose to the occasion and allowed this conference to be held in his own colliery compound and bore the cost of the conference. Emboldened by his example, several other colliery owners came to the conference as distinguished visitors. The conference was addressed by many public leaders including Dacca Chaudhral, Shri Dipnarain Singh and others and created such an atmosphere in the coalfields that the mine-owners declared a substantial wage increase immediately after the conclusion of the conference.

The condition of labour in the coal industry was extremely miserable in those days. The labourers were recruited and paid through the raising contractors. The contractors would deduct the wages as they liked. The management had little contact with them. There was no provision for housing, water supply, medical and sanitary arrangements, etc. Their income was extremely meagre and they continually suffered from hunger and disease. There was no labour legislation worth the name to protect the interest of the labourers. The policy of the Government was to get as much coal as possible at the cheapest possible rate for the loco and other industries. Most of the evils in the coal industry today such as contract system (now abolished), unscientific mining, premature collapse and underground fire, etc., are substantially due to the short-sighted policy of the Government. Labour unions also could not function properly for the joint opposition of the employers and the Government. Conditions, however, improved slightly after the Trade Unions Act was passed in 1926. Meanwhile some minor legislations also were passed to provide water supply, housing and sanitation, etc.

In 1928, the ninth session of All-India Trade Union Congress was held at Jharia without any opposition from any quarter. This was to be presided over by C. F. Andrew but owing to his absence Mr. Daud of Saman's Union presided. The conference was very well attended. The Communist Party wanted to capture the office of the All-India Trade Union Congress in this session and set up a candidate for election as President. But Pandit Jawaharlal Nehru whose name was put up by the Congressites was elected President.

by a thumping majority. Pandit Nehru, Diwan Chamanlal, V. V. Giri and a number of prominent leaders had attended the session. Some delegates from foreign countries had also attended the session.

The Indian Colliery Employees' Association had continued its activities and remained as a sort of representative of labour in the coalfield till the year 1928, when different labour associations were formed to safeguard the interest of Tata Collieries labour. In 1932 there was a break in the Indian Colliery Employees' Association and another union, a rival union, namely, the Indian Miners' Association was formed with Shri K. N. Bhattacharya as President. None of these unions were registered, but the Indian Colliery Employees' Association was registered as "Indian Colliery Labour Union" in 1932.

This in short is the history of early trade unionism in the area which remained more or less a reformist movement till the year 1936-37 when the Congress Ministries were formed in many of the provinces in India as well as in Bihar. But one point should be also mentioned that when in 1931 a Royal Commission on Labour in India were appointed to investigate and report on the living and working conditions of workers, the coal labour was represented there by Shri K. N. Sen Gupta and Shri Sheo Kali Bose.

In 1938 Gandhi Sewa Sangh Mazdoor Samiti under the instructions and guidance of Gandhiji started a course of training for the labour workers at Ahmedabad Textile Labour Association. Some young men like Shri Mukundhari Singh and other after getting their training in Ahmedabad came to Jharia Coalfield and started organising labour here. The first attempt in organising a general union of coal workers was made in 1939, when Chotanagpur Association was formed. It had a very large membership and some of the biggest strikes in the coalfield like the three labour strikes of Kustore collieries involving about six thousand workers and lasting each for more than three months were launched. Then came the World War II and with the rise of prices of commodities, the first demand for dearness allowance was made, and as a result of negotiations with the employers, a 10 per cent increase in wages as dearness allowance was given. It was at this time that the Bihar Labour Enquiry Committee was appointed under the leadership of Dr. Rajendra Prasad, later first President of the Indian Republic. The members of the Enquiry Committee visited coalfields, took evidence and for the first time attempts were made to go deep into the living and working conditions of the coalminers. The efforts of the Committee went a long way in ameliorating the conditions of the workers.

As war progressed most of the labour leaders were put in jail and labour movement came to standstill for the time being. Due to war, there was a great fillip to the coal industry and coal owners made enormous profits. But wages and other amenities for workers

were not appreciably increased. Naturally, there was discontentment, but due to various ordinances and stiff measures nothing tangible was visible and labour agitations were almost negligible. It should be noted that during this period more specially when Russia entered the war on the side of the allied, Communist elements got some hand and in collaboration with interested persons tried to organise the workers in the name of war efforts. In coalfield, the followers of Mr. M. N. Roy formed a branch of Indian Federation of Labour (Radical Democratic Party) and for sometime they were the only people seen moving about and working among the workers. But they could not fully succeed in leaving lasting impression on the workers.

The Kustore Workers' Union, the first militant labour movement was started under the aegis of Kustore Workers' Union in the year 1939, when the first successful strike of about six thousand workers began on the question of reinstatement of a few workers, but resulted in other important grants to the workers. Another strike in Kustore began in 1940 and yet another in 1941 both lasting over 100 days. Regular union was started there which properly functioned till the war came. Its activities were again revived in 1946 and yet another big strike was fought successfully by the workers in 1946-47, just on the eve of the appointment of Conciliation Board.

Then ended the war and the Congress Ministries were formed again in most of the provinces. Coal workers who had their grievances all through the war felt very much agitated. They had their own Government and that instilled a new fate in them. At this very period (1946-47) the Congress Socialist Party members took up organisation of workers and a series of strikes over length and breadth of the coalfield began. The employers who were then unaccustomed to mass movements were taken aback and felt unnerved. At the same time they were conscious that there was scope for increase in wages and other amenities of workers. Concessions were granted to workers and union after union began to be formed. Government also stepped in and appointed the first "Conciliation Board" in 1947, which after a thorough enquiry, submitted its report and this was considered quite favourable. For sometime the formation of union after union continued, but the need for one centrally organised labour union was felt and the Koela Mazdoor Panchayat was formed in 1949 to organise the coal workers. But unfortunately coal workers' rival trade unionism was growing and with the formation of I.N.T.U.C. (1947-48) that rivalry became all the more apparent and I.N.T.U.C. people began to organize the labour in right earnest and the Indian National Coal Mines Workers' Federation was formed in 1949. Subsequently, Bihar Colliery Mazdoor Sangh was formed to organise coal workers in Bihar and it was registered on 6th February 1961. Of late, there is a tendency on the part of labour leaders of organising rival trade unions in the same industry in this district.

STATISTICS OF REGISTERED TRADE UNIONS AND FACTORIES IN DHANBAD DISTRICT.

Side by side with the growth of trade unionism in the State, the number of registered trade unions were also increased considerably. There were only 18 registered unions in 1938-39 and in 1954-55 the number rose to 498. In Dhanbad district the number in 1961 is 95. This is the largest number of registered trade unions in a district in Bihar.

There are about 470 registered factories excluding collieries in the district of Dhanbad employing 28,349 workers. A number of unregistered establishments employing a large number of workers have also sprung up in this district.

The conciliation machinery of the State Government looks after the labour matters in these industries and in recent years it had successfully intervened in the disputes raised by different workers' organisations. As a result of this, the following benefits were secured to most of the industrial workers in the matter of—

- (a) Bonus.
- (b) Payment of retrenchment reliefs.
- (c) Reinstatement and re-employment of discharged workers.
- (d) Holidays.
- (e) Revision of scales of pay.
- (f) Welfare amenities, etc.

The district of Dhanbad has got two main distinct portions. The town of Sindri and the areas of Kumardhubi form the belt which has some of the biggest factories of their kind in this district. The remaining areas are either agricultural or mining areas producing coal and other ancillary minerals.

There are altogether 402 factories running with power and 15 factories running without power according to the figure of 1959 registered under the Factories Act. About 27,349 people are working in this district in the registered factories. This number, however, does not include the workers employed on construction work relating to the factories. The following is the industrial classification of some of the factories*:-

Serial no.	Classification.	No. of factories.
1	Flour, rice and <i>dal</i> mills	192
2	Smelting and refining lead	1
3	Saw mills	22
4	Electricity generating	14

* Extract from the book *Registered Factories under the Factory Act, 1946*, in the State of Bihar, corrected up to 30th September, 1959, pp. 224—240(a).

Serial no.	Classification.	No. of factories.
5	Ice factory (manufacture of ice)	3
6	Fireclay	9
7	Repairing works	12
8	Iron casting	7
9	Glass bangles	2
10	Casting of machinery parts	10
11	Printing	20
12	Ammonium sulphate	1
13	Mining equipment	5
14	Repairing of colliery machines	4
15	Sodium of silicate	2
16	Repairs and fabrication	4
17	Nail manufacturing	2
18	Re-rolling iron-gate	4
19	Furniture	7
20	Miscellaneous	96
TOTAL		417

According to the annual report of the Inspector of Factories, Dhanbad, there are 570 factories in total in 1962 in the district, employing about 38,349 workers.

Labour Welfare.

For the successful implementation of the different objectives to be realised through various labour laws regarding advancement of the general condition of work, health, remuneration, safety and security it had been contemplated in the two Five-Year Plans to augment the strength of the Factory Inspectorate so that frequency of inspection may be increased. To achieve the end one Inspector of Factories with staff has been posted at Dhanbad.

Secondly, one Labour Superintendent and three Labour Officers are posted at Dhanbad under the programme of expansion of the Labour Department. The Labour Officer looks after labour welfare work in the different industrial establishments in the district. His duty covers housing condition, recreational, educational and sanitary facilities for the workmen. The employees have to be provided with canteens, dispensaries, hospitals and other requirements under the Factories Act. Provisions under the Minimum Wages Act, 1948 safeguard the interest of the workers employed under its schedule in a motor transport, road construction and building operation, stone-breaking, rice, oil and dal mills and local bodies. The Minimum

Wages Act has also been made applicable to the workers employed in agricultural operation.

Welfare amenities supplied by Factories in the district under the Factories Act.

As regards provision for welfare facilities to industrial workers it may be noted that under Bihar Factories Act, 1948, there has been provision for welfare facilities mentioned below:—

Washing facilities.—In every factory adequate and suitable facilities for washing shall be provided and maintained for the use of the workers therein. Separate and adequately screened facilities shall be provided for the use of male and female workers. In every factory suitable arrangements for sitting shall be provided and maintained for all workers obliged to work in a standing position, in order that they may take advantage of **any opportunities** for rest, which may occur in the course of their work.

First-aid boxes have to be maintained. In every factory with more than five hundred workers an ambulance room of the prescribed size containing the prescribed equipment and in the charge of such medical and nursing staff as may be prescribed has to be maintained.

Canteens.—The State Government may make rules that in any specified factory where more than two hundred and fifty workers are ordinarily employed, a canteen or canteens shall be provided and maintained by the occupier for the use of the workers.

Shelter, rest rooms and lunch rooms.—In every factory where more than one hundred and fifty workers are ordinarily employed, adequate and suitable shelters or rest rooms with provision for drinking water shall be provided and maintained for the use of the workers.

Creches.—In every factory where more than fifty women workers are ordinarily employed there shall be provided and maintained a suitable room or rooms for the use of children under the age of six years of such women. Such rooms shall provide adequate accommodation, shall be adequately lighted and ventilated, shall be maintained in a clean and sanitary condition and shall be in charge of women trained in the care of children and infants.

Welfare Officers.—In every factory where five hundred or more workers are ordinarily employed the occupier shall employ in the factory such number of Welfare Officers as may be prescribed.

Welfare Facilities provided by Factories.

Loyabad Coking and By-products Recovery Plant, Bansjora.--Majority of the workers have been provided with quarters free of rent. Free fuel is provided to the workers of the factory. Free electricity and street lights have been provided in general. Drinking water facilities have been provided from taps. Sanitation in the labour and staff quarters' area is looked after. Ten service latrines and one sanitary latrine have been provided in the plant premises for the use of workers.

A dispensary for both workers and dependents is provided. This dispensary is staffed by one doctor and two compounders. Serious cases are treated at the Loyabad Hospital managed by the company and free diet is given to the children of the workers.

Burn and Company, Limited, Guljarbari.--The company has built 29 houses for staff, 238 houses for labourers and six houses for security guards. No rent is charged for the quarters allotted to employees. Those who have not been provided with quarters or any accommodation are given Rs. 6 per month.

A canteen, a creche and a rest-shelter have been provided.

Fertilisers Corporation of India, Ltd., Sindri.--About 5,727 persons have been given accommodation in the company.

A hundred-bedded hospital at Sindri with dispensaries in Shaharpura, Rohraband, Domgarh, Sindri and Rangmati areas and a separate public health wing have been provided.

The company runs two high schools for boys and girls, one middle school, one upper primary, two lower primary and one Kindergarten school for the children of the employees. The children of staff up to Rs. 150 per month are exempted from paying the tuition fees in the schools.

A welfare centre with recreational and cultural facilities are provided to the workers. The centre has provisions for indoor games, library, adult literary centre, training in sewing, knitting, embroidery and fine arts.

For outdoor games the factory has opened Sindri Central Sports Association. The company grants Rs. 6,000 per year to the Association.

Kumardhubi Fireclay and Silicate Works, Kumardhubi.--An adult education centre has been opened. A well equipped and spacious club for the workers has been provided in the workers' colony with a number of indoor and outdoor games, library and other recreational facilities. Hindi and Bengali pictures are exhibited twice a week. Frequently dramas, social and religious functions are arranged. The factory runs a number of schools for the benefit of the workers. The factory provides free housing accommodation to about 1/3rd of the employees. It has 3,300 workers.

Eagle Rolling Mills, Kumardhubi.—The factory employs about 500 workers. It has started an adult education centre in 1954. A well equipped club has been provided for the workers with games and library. Hindi and Bengali pictures are shown twice a week. A canteen has been started. The factory provides free housing accommodation to about one-third of the employees. Under Industrial Housing Scheme, about 100 quarters have been constructed for the employees of this factory by the State Government. There is a creche for the female labourers. A Welfare Officer has been appointed by the Company to look after the interests of the workers.

Engineering Works, Kumardhubi.—This factory employs about 2,850 workers. Since 1959 there is a middle school with about 200 students and five teachers. A well equipped club has been provided for the recreation of the workers. The factory provides free housing accommodation for about 1,000 workers. Under Industrial Housing Scheme 200 quarters have been allotted by the State Government to the workers of this factory. A canteen and a creche have been provided by the factory. A Welfare Officer has been appointed to look after the welfare interests of the workers.

There is a labour welfare centre sponsored by State Government and also a voluntary welfare centre started by the Company where the workers of all the industrial units of Kumardhubi have an access. A hospital with about 57 indoor beds has been started by the Company. Besides, the Employees' State Insurance Dispensary has been started by the Government where only the registered employees of all the factories within Kumardhubi town are treated. Ten beds in the Company's hospital are reserved for hospital cases from the E. S. I. Dispensary. A Labour Liaison Officer has been appointed by the Company to look after the welfare interests of the workers of all the four industries in the town.

Reliance Firebricks Factory, Chanch.—The factory employs about 1,400 workers. The factory has appointed a Welfare Officer to look after the interests of the workers. A recreation club has been started in 1960 in the workers' colony with a number of indoor and outdoor games and a library. The factory has started one voluntary welfare centre, one middle school with 425 students and 9 teachers. The factory provides free housing accommodation to about 600 worker. A canteen and a creche have been provided for the workers. The factory has a 10-bedded hospital. The State Government has also started one Employees' State Insurance Dispensary for the workers in 1959 with one doctor, three compounders and two dressers.

The Bihar Firebricks and Pottery, Limited, Mugma.—The factory employs about 1,200 workers. A Welfare Officer has been appointed by the factory. A recreation club, a voluntary welfare centre, a middle school with 315 students and seven teachers, a canteen, a creche, and a library have been provided by the factory. About

579 workers have been given houses. There is one Employees' State Insurance Dispensary with one doctor, two compounders and two dressers. The factory has one six-bedded dispensary for the workers.

Bihar-Bengal Firebricks Factory, Mugma.—The factory employs about 735 workers. A Welfare Officer has been appointed. A canteen, a creche and a small recreation club have been provided by the factory. The factory runs one small dispensary for the workers. About 243 employees have been given housing accommodation.

Jawahar Firebricks Industry, Mugma.—It employs about 575 workers. For the welfare facilities a canteen, a creche and a recreation club and a dispensary have been provided by the factory. About 129 employees have been given housing accommodation. The workers of the three above factories at Mugma are given the usual facilities in Labour Welfare Centre and Employees' State Insurance Dispensary at Mugma.

Lead Smelting Refinery Industry, Tundoo.—The factory employs about 500 workers. A recreation club, a primary school, a dispensary, a canteen and a creche have been provided. There is no Welfare Officer. About 93 employees have been given housing accommodation and the other workers are given house rent allowance, i.e., a sum of Rs. 6 per month. Every month a film show is held for recreational purposes.

Khandhwal Glass Works, Chota Ambona.—A canteen has been provided for workers in which the management pay overheads, but try to recover the cost of food-stuffs. Tea and snacks are provided in the morning and meals during the break.

A rest shelter with benches has been provided where drinking water is supplied. A dispensary for both workers and their dependents is provided.

Welfare Centres.—There are several welfare centres in the district for the benefit of workers run either exclusively by the Government or on the employers' and workers' contribution.

The only welfare centre run by the Labour Department of the State Government is known as Shram Kalyan Kendra situated at Kumardhubi. Recreational and cultural facilities are provided here to the workers and their dependents. Education in sewing, knitting, embroidery and fine arts is also imparted here. The centre has also got a film projector of 16 mm. and a propaganda-cum-health van. Facilities for indoor and outdoor games also exist here.

The welfare centres run on the contributions of the employers and labourers are situated at Chanch, Mugma, Siadri, Gulfaubari, Karanpura, two at Kumardhubi, Chota Ambona and Jharia and there are libraries in each of the welfare centres for the benefit of workers. These are called voluntary labour welfare centres and get

occasional grants in cash or kinds from the Labour Department. Canteens and creches are maintained as provided under the Factory Act and Mines Act.

Workers in Shops and Establishments.

From 15th July, 1958, the State Government enforced the Bihar Shops and Establishments Act in Dhanbad which grants adequate protection to the unorganised workers employed in shops, commercial establishments, hotels, cinema houses, etc.

There are 11,924 shops and establishments registered under the Bihar Shops and Establishments Act, 1953, in Dhanbad district. Approximately 55,000 workers are covered under this Act in the district. The Act regulates working conditions, period of payments, deductions of wages and refusal of leave by the employers of the shops and establishments. The enforcement of the Act is the responsibility of the Labour Officer, Dhanbad.

Minimum Wages Act.

The Minimum Wages Act was enacted in 1948. The following schedule shows the scale of minimum wages payable to the employees in the stone-breaking and stone-crushing industries and in the employment in Damodar Valley Corporation:—

SCHEDULE.

Serial no.	Category of employees.	Minimum rates of wages.
1	Unskilled adult <i>Mazdoor</i> ..	Rs. 1.37 per day.
2	Mining and carting—	
	(a) Within and up to a quarter mile.	Rs. 8.50 per 100 cubic feet.
	(b) For every quarter mile ..	Rs. 1.75 per 100 cubic feet.
3	Mining chelly breaking and transport.	Rs. 2.50 per box of 25 cubic feet.
4	Hand breaker—	
	(a) Chelly breaker from boulders.	Rs. 2.00 per box of 25 cubic feet.
	(b) Chelly breaker from <i>niztolai</i> .	Rs. 0.65 per box of 5 cubic feet.
5	Ballast breaker from boulder—	
	(a) 2 " —3 " ..	Rs. 5.00 per 100 cubic feet.
	(b) 2 " —2½ " ..	Rs. 6.50 per 100 cubic feet.
	(c) 1½ " —2 " ..	Rs. 8.00 per 100 cubic feet.
	(d) 1 " ..	Rs. 10.00 per 100 cubic feet.

Serial no.	Category of employees.	Minimum rates of wages.
6.	Ballast breaker from <i>niztolai</i>	Re. 0.77 per box of 5 cubic feet.
7	Chips breaker—	
	(a) Hand-made chips of $3\frac{3}{4}$ " down.	Re. 0.28 per cubic feet.
	(b) Hand-made chips of down.	Re. 0.20 per cubic feet.
8	Earth cutter—	
	(a) For soft earth ..	Rs. 1.50 per 100 cubic feet.
	(b) For hard and semi hard earth.	Rs. 1.75 per 100 cubic feet.
9	Borer or driller ..	Re. 0.50 per feet.
10	Miner	Rs. 2.40 per 25 cubic feet.
11	Wagon loader (full load of broad gauge wagon of 500 cubic feet and upward).	Rs. 6.60 per wagon.
12	Unskilled Mazdoor ..	Rs. 1.75 per day.
13	Feeder	Rs. 1.90 per day.
14	Fitter	Rs. 2.25 per day.
15	Fitter (untrained) ..	Rs. 1.65 per day.

Monthly-rated.

16	Operator	Rs. 77.00 per month.
17	Clerical staff	Rs. 66.00 per month.
18	Work <i>Sardar</i> or mate ..	Rs. 55.00 per month.
19	Peon or <i>Darwan</i> ..	Rs. 45.00 per month.
20	Stone set (stone bricks)—	
	(i) Breaking size 9 " \times 6 " \times 4 " ..	Rs. 8.00 per hundred.
	(ii) Stone set (stone brick pouching) ..	Rs. 4.50 per hundred.
	(iii) Stone set (stone brick) carting and transporting from a distance of 2 to 4 miles.	Rs. 3.25 per hundred.
21	<i>Chowkidar</i>	Rs. 45.00 per month.
22	Labour (Blacksmith) ..	Rs. 45.00 per month.

Serial no.	Category of employees.	Minimum rates of wages.
23	Mate	Rs. 2.50 per day.
24	Road mate	Rs. 2.50 per day.
25	Mason	Rs. 3.25 per day.
26	Carpenter	Rs. 3.25 per day.
27	Painter	Rs. 3.25 per day.
28	Motor Truck Driver ..	Rs. 100.00 per month.
29	Bullock cart driver with bullocks and cart.	Rs. 6.00 per day.

As regards Minimum Wages Act of agricultural classes of people it may be mentioned that in exercise of the powers conferred by clause (b) of sub-section (1) of section 3 of the Minimum Wages Act, 1948 (XI of 1948), the Governor of Bihar has been pleased to fix, within the meaning of clause (iii) of sub-section (i) of section 4 of the said Act, the minimum rates of wages, which shall be payable in the whole of the Dhanbad district to employees in respect of the different classes of work in agriculture and in operation ancillary to agriculture specified in the said schedule. The rates are as follows:—

Category of employees.	Name of agricultural operations.	Minimum rates of wages.
(a) Adult and adolescent employees.	Ploughing, embanking, harrowing, manuring, sowing of weeding, irrigating, threshing, winnowing, uprooting, transplanting, harvesting and all other agricultural operations incidental or ancillary to agriculture not mentioned in this schedule.	3 seers 12 chattaacks of paddy and 4 chattaacks of rice or <i>chura</i> or <i>murhi</i> or <i>satto</i> per day.
(b) Child employees	Ditto ditto	— 4 seers 4 chattaacks of paddy and 4 chattaacks of rice or <i>chura</i> or <i>murhi</i> or <i>satto</i> per day.

Where the minimum rates of wages are paid in cash, the cash value of the wages to be paid in kind shall be computed in accordance with the Bihar Minimum Wages Rules, 1957, but in no case the minimum rates of wages payable in cash to adult and adolescent employees shall be less than Rs. 1.25 nP. per day in the district. For child employees, the minimum rates of wages to be paid in cash shall not be less than 75 nP. per day in this district. Men and women shall get the same rate of wages.

COAL MINES LABOUR WELFARE FUND.

The Coal Mines Labour Welfare Fund was started in 1944 in Dhanbad. It is under the Central Government. It is, by far the biggest statutory fund in the country, devoted to the task of promoting the welfare of colliery workers, completed the 18th year of

its existence assiduously continuing its endeavours to improve the living and social conditions of the labour population in the coal mining industry.

The main activities of the fund are—

- (i) Provision and improvement of housing accommodation.
- (ii) Provision of adequate medical facilities both preventive and curative.
- (iii) Provision and improvement of water-supply arrangements.
- (iv) Anti-malaria operation.
- (v) Provision and improvement of educational and recreational facilities.
- (vi) Improvement of the standard of living.

Medical facilities.

Medical facilities on an extensive scale, one of the most outstanding achievements of the fund, continued to be provided by the organisation. The facilities provided *inter alia* include provision and maintenance of hospitals, maternity and child welfare centres, T. B. treatment facilities, dispensary services including Ayurvedic dispensaries, etc. The progress with regard to these is summarised below in brief:—

Central Hospital.—This 250-bedded modern hospital staffed and equipped to render all types of specialists' diagnosis and treatment to colliery workers and their dependents has been functioning since 1951. The average daily number of in-patients treated in the hospital during 1960-61 was 333 against 302 during the previous year. The number of new patients treated in different departments of the hospital during the year, i.e., 1960-61 is given in the following table:—

Department.	Outdoor patients.	Indoor patients.
1. Medical	9,891	3,292
2. Surgical	11,514	2,683
3. Maternity and Gynaecological.	2,043	857
4. Eye and E. N. T. ..	3,411	331
5. Dental	741	..
6. Venereal diseases ..	1,055	158
Total	28,658	7,321

A Blood Bank on modern lines for the benefit of colliery patients started functioning in the hospital. Blood is collected from free volunteers and also purchased from donors at the rate of Rs. 10 per bleeding of 250 c.c. plus Re. 1 for refreshment.

The hospital has a social worker attached to it who attends to the personal needs of the patients for their correspondence, private matters, etc.

Maternity and Child Welfare Centres.—A maternity and child welfare centre is attached to the hospital.

T. B. Treatment.—The number of beds provided by the fund for the treatment of T. B. patients is 12. The scheme for payment of subsistence allowance at a rate not exceeding Rs. 50 per month to the dependents of T. B. patients undergoing treatment as indoor patient at the fund's T. B. Clinics or at the beds reserved by the fund in the hospital is existing.

Ayurvedic Dispensaries.—In addition to Central Hospital, T. B. clinics, maternity and child welfare centres and dispensaries providing allopathic line of treatment, the organisation also maintained three Ayurvedic dispensaries at Jagjivan Nagar, Khas Jecnagora and Bhuli in Dhanbad district.

Besides, the Central Hospital has been provided X'ray facilities. The fund has also provided ambulance vans to the hospital.

Family counselling centres are run at the Central Hospital and about five thousand cases attended to the centre and sterilisation was done on 293 cases.

Incidence of leprosy in the coalfields is not inconsiderable and to provide facilities for treatment to colliery leper cases, wards have been provided at the cost of the fund at the Tetulmari and Asansol leprosy hospitals which are run by the Dhanbad District Leprosy Relief Association and the Asansol Leprosy Board respectively. Twenty-two beds have been provided in Dhanbad. The wards have been equipped and electrified at the fund's cost.

With a view to protecting from infection the coal miners whose parents are suffering from infectious diseases like leprosy and T. B. and who have not been segregated and are living with their families, the Coal Mines Labour Welfare Fund Organisation has set up a residential home at Bhuli township for those children

in the age-group of 6—14 years. It was started on the 6th September 1960 with twelve children on the opening date. The children admitted at the home are provided with nourishing food, education and recreation.

Anti-Malaria Measures.—The malaria control work, the first major project undertaken by the organisation from its very inception, entered into its sixteenth year of systematic operation. Three thousand seven hundred and eighty-two persons received anti-malaria drugs during the year. In recognition of the good work done, the Malaria Unit of the organisation was awarded a certificate of merit for 1958-59 by the National Society of Malaria and other Mosquito Borne Diseases.

Education and Recreation.

Miners' Institute.—To the chain of Miners' Institute set up by this organisation, one more was added at Samla Kendra Colliery in West Bengal Coalfield on 18th August 1960. These institutes, each comprising of an Adult Education section and a Women-cum-Children's Welfare and Education section have been established by this organisation in different coalfields for providing educational and recreational facilities to colliery workers and their dependents. Fifty-six such institutes are functioning in different coalfields in the district.

Women's Welfare-cum-Children Education Centres.—Sixty Women's Welfare-cum-Children's Education centres are functioning in Multi-purposes Institutes and accommodation has been offered by the colliery owners. Nine Feeder Adult Education centres for women are also opened. The centres provide elementary education to workers' children up to Class II standard. The children attending the centre are given bath in the morning. They are then dressed with garments supplied free by this organisation. Healthy and interesting games are played at all the centres. Free supply of milk and tiffin is distributed amongst the children attending the Women's Welfare Centres.

Besides training in handicrafts like sewing, tailoring, embroidery, repair of garments, etc., literary classes are held for women at all the centres as usual. The total number of women turned literate up to 31st March, 1961 was 1,146. All the centres have been provided with a sewing machine and other materials required for handicraft work.

Adult Education Centres.—Sixty-one Adult Education centres are functioning in various coalfields. During the year 1960-61, 1,816 adults were made literate. A small library containing about 400 books is being maintained at each centre and the same is being used by a large number of persons. Study tours and excursions to places of interest are arranged.

For providing increased facilities for Adult Education the scheme of opening Feeder Adult Education centres which was introduced three years ago, has been working successfully. One hundred and thirteen centres have so far been functioning under this scheme and necessary action to add more to this was taken.

As an incentive and encouragement to greater efforts, the organisation pays scholarships to the wards of colliery workers who are meritorious in their studies. The rates of scholarships have also been enhanced as shown below:—

- (a) Rs. 20 per month per student for Class V and VI.
- (b) Rs. 25 per month per student for Class VII and VIII.
- (c) Rs. 30 per month per student for Class IX and X.
- (d) Rs. 50 per month per student for Class XI and XII.

Pre-University Course. Degree Course including Technical Degree Course.

Training for Welfare Personnel.—The training course for the third batch of 33 trainees at the Welfare Personnel Training Institute, Bhuli which had commenced from November, 1959 was completed. Training of the fourth batch which was started from 1st August, 1960 with 21 trainees was completed in January, 1961. Twenty trainees are declared successful.

Facilities for Training Leadership and Discipline.—The National Discipline Scheme introduced in six institutions in West Bengal Coalfield was continued and free supply of uniforms by the organisation to the children of colliery workers undergoing training at the institutions are continuing. Efforts are in hand to cover more schools in the coalfield areas by extending the facilities to them also.

Training Camps for Children of Coal Miners in Leadership and Discipline.—Training camp for the children of coal miners was introduced in September, 1959 at Bhuli township for imparting training in physical education, leadership and discipline. Under this scheme (of children's training camp) 180 children are being trained.

Games and Sports.—A total sum of Rs. 50,900 was spent on organising games and sports for colliery workers in the different coalfields. Besides this, the first All-India Coalfield Foot-ball Tournament was also conducted during the year under report and a sum total of Rs. 9,000 was spent for the purpose.

Health week.—Health Week Fortnight was also organised in almost all the coalfields at a cost of Rs. 23,500.

Exhibition of Films.—The four mobile cinema units maintained by the organisation one each in Jharia, Raniganj, Karanpura and Ramgarh and Pench Valley Coalfields gave a total of 714 shows during 1960-61. Arrangement was made for provision of similar projectors in the other coalfields also.

Yogic Exercise.—A *yogic* teacher was appointed for teaching *yogic* exercises to the colliery workers at the Miners' Institute of the fund at Dhanbad. The workers are taught different exercises by him which they are encouraged to practise regularly.

Enforcement of Statutory Provision.

1. **Coal Mines Pit-head Bath.**—The Coal Mines Pit-head Bath Rules, 1946 continued to be administered by the Coal Mines Labour Welfare Organisation. Pit-head Bath has to be given at every coal mine whose monthly output during the previous calendar year exceeded 500 tons. Exemption from the provision of Pit-head Bath is granted in case of those mines the resources of which are likely to be exhausted within the next three years. The total number of collieries where Pit-head Bath had been completed was 225 and those of collieries where they are under construction, was 80.

2. **Creche in Coal Mines.**—Under the existing rules the owner/agent or Manager of every mine in which not less than 50 women workers have been employed on any one day of the preceding twelve months is required to provide a creche. Supply of diet to children at the creches is now compulsory. A total number of 392 creches are completed and 61 are under construction.

3. **Prosecution.**—For contravention of the Coal Mines Pit-head Bath Rules and Mines Creche Rules 104 prosecutions were launched in 1961.

4. **Workmen's Compensation.**—With a view to getting the settlement expedited, the members of the Inspectorate staff of the organisation follow up cases of accidents in coal mines which involve payment of compensation. Out of a total of 6,510 cases reported, 6,014 were followed up during the year 1961. 5,244 cases were admitted and 770 were not. Payment was made in 3,006 cases.

Miners' House.

(a) **Township.**—Under the fund's first scheme of construction of experimental township, the organisation constructed in all 1,566 houses at Bhuli, 48 houses at Bijoy Nagar, 219 houses at Bokaro, 180 houses at Kargali, 50 at Giridih, 50 at Bhurkunda and 40 at Kurasia.

(b) **Subsidised Housing Scheme.**—Under the old subsidy scheme of the fund envisaging payment of subsidy to colliery owners at the rate of 20 per cent of the cost of the construction, the number of houses constructed were 1,638 up to end of 1961.

(c) **Subsidy-cum-Loan Scheme.**—Under this scheme which provides for payment of a subsidy of 25 per cent and loan of 37½ per cent of the cost, 2,060 houses were completed and 103 houses were under construction during 1961.

(d) *New Housing Scheme*.—Under the New Housing Scheme of the fund which provides for construction of 30,000 houses by the fund at a cost of more than 10 crores, at the close of the year under report, 13,525 houses were in different stages of construction at 296 collieries. An expenditure of Rs. 1,46,10,842 had been incurred on the New Housing Scheme during 1961.

(e) *Kutcha Houses*.—Government sanctioned a sum of Rs. 6,000 during 1961 for construction of 30 *kutcha* houses.

Other Amenities.

1. *Death Benefit*.—The scheme for grant of financial assistance to the widows and school-going children of colliery workers who meet with death as a result of fatal accidents at collieries at the following rates was in operation during 1961. Under the scheme a monthly allowance of Rs. 10 per month to the widow of the deceased worker for a period of two years and a scholarship of Rs. 5 per month to each of the children of the deceased worker attending school for a period of three years were being paid. A total sum of Rs. 15,300 was sanctioned during 1961 for payment to 57 widows and nine school-going children.

2. *Co-operative Movement in Coalfields*.—As a result of the drive launched by the organisation since 1958 to free the coal miners from the clutches of unscrupulous money-lenders the Co-operative movements gained momentum and became increasingly popular. A total of 147 Co-operative Societies have been registered and are functioning in the various coalfields. A sum of Rs. 4,50,000 was sanctioned out of the Coal Mines Labour Welfare Fund for extending credit facilities at a low rate of interest to the Colliery Employees' Co-operative Societies through the Co-operative Banks in the State of Bihar.

3. *Holiday Home for Coal Miners*.—The Holiday Home set up at Rajgir in Patna district on an experimental basis is becoming popular. Batches of workers are sent to the Holiday Home.

4. *Welfare of the Visually Handicapped*.—For educating and teaching crafts to the visually handicapped colliery workers and their children to enable them to lead a more purposeful life for which a Blind School has been set up at Bhuli township by the Dhanbad Blind Relief Society, the question of payment of suitable non-recurring and recurring grants to the above society was taken up by the organisation.

5. *Excursion-cum-Study Tour for Coal Miners*.—In order to provide the colliery workers the rare opportunity to visit important places in the country, an excursion-cum-study tour is being arranged every year from 1959 by running a special train.

6. *Publicity through Exhibition*.—The Publicity Section of the organisation had participated in the State Industries Fair in 1960 at

Asansol and an exhibition at Banksimulia Group of Collieries in the Raniganj Coalfield and had put up stalls to acquaint the coal miners and general public with the various activities of the Coal Mines Labour Welfare Organisation in the field of promoting the welfare of the workers engaged in an industry so vital to the Nation.

COAL MINES PROVIDENT FUND SCHEME.

Background.

The general awakening and upsurge among all sections of the people just before the country's independence augmented the feeling of dissatisfaction among industrial workers with their unsatisfactory and, in some cases, deplorable working conditions and the pressure for immediate amelioration became irresistible. In the coal mining industry where the workers were eking out a precarious living with inadequate wages and a complete absence of social security, the unrest was acute. This led the Central Government to appoint a Board of Conciliation in 1946. In May, 1947, the Board recommended, *inter alia*, the payment of a month's basic wages once a quarter as attendance bonus and the institution by law of a scheme of Compulsory Contributory Provident Fund for the colliery workers. Being payable on the worker conforming to a specified minimum attendance in a quarter, the bonus served as an inducement for more regular work but it was felt in certain circles that the Provident Fund Scheme might not be successful as the labour force was extremely casual. Despite these forebodings, an Ordinance was promulgated in April, 1948 to confer powers on the Central Government to frame the detailed statutory scheme of Provident Fund. The Ordinance was later repealed by an Act and the Coal Mines Provident Fund Scheme notified in December, 1948.

Initial difficulties.

This scheme was inaugurated in a virgin field. As the scheme increased the expenses of the employer on account of their liability to pay contributions and charges to defray the cost of administering the scheme, Government allowed an adequate increase in the selling price of coal to give the employers full neutralisation of their additional liability. While the employers' objections could be understood, surprisingly enough, there was resistance in the beginning from a large number of workers as the scheme involved a reduction in their already meagre take-home wages. As the employers were enjoined by penal clauses to make this deduction the workers' opposition could not prevent recovery. The illiteracy of the workers, their covert, if not expressed, hostility, the transient nature of the labour force, the far flung location of many of the coal mines and unwillingness of some of the employers to pay their contribution and to submit returns, etc., were some of the difficulties in the midst of which the scheme was born. Despite these obstacles the scheme has been a success which belied the counsels of the prophets of gloom.

Scope of the Scheme.

(i) The Coal Mines Provident Fund Scheme which was initially applied to the States of Bihar and West Bengal from the 12th May, 1947 and to the States of Madhya Pradesh and Orissa from the 10th October, 1947 was subsequently extended to erstwhile States of Rewa, Korea and Talcher as well as to the States of Assam, Andhra Pradesh, Rajasthan and Maharashtra. The scheme now, applies to 1,213 coal mines both in the public and private sectors, spread all over the country except Jammu and Kashmir.

(ii) In the States of Andhra Pradesh, Rajasthan and also in the erstwhile States of Rewa, Korea and Talcher every employee receiving basic wages not exceeding Rs. 300 per month is required to become a member of the Fund immediately after the end of the quarter following the quarter in which he qualifies for a bonus under the Coal Mines Bonus Scheme.

In the States of Bihar, West Bengal, Orissa, Madhya Pradesh and Maharashtra every employee with the exception of the following is required to become a member of the Fund on putting in 105 days' attendance if employed underground and 130 days' attendance if employed on the surface, during a period of six months:—

- (i) Such employees of National Coal Development Corporation collieries as are either pensionable or governed by conditions of service applicable to Railway employees or which have been drawn up by the Corporation; and
- (ii) Contract labour engaged in building, brick-making or tile making.

The eligibility conditions in Andhra Pradesh, Rajasthan and the erstwhile States of Rewa, Korea and Talcher will soon be brought at par with those prescribed for other States. Over 13 lakhs of workers have so far been enrolled as members of the Fund of which a little over four lakhs are now in the live list of subscribers.

The Rate of Contribution and Its Evolution.

Originally the rate of contribution to the Coal Mines Provident Fund was one-sixteenth of basic wages only on both employers' and employees' side. The wage structure then obtaining in the coal industry consisted of low basic wages with relatively much higher dearness allowance and consequently the amount that an average employee could accumulate in the Fund was pitifully small. To give them a somewhat reasonable provision for their old age Government enhanced the rate of contribution in the middle of 1955 from one-sixteenth of basic wages to one-sixteenth of basic wages and dearness allowance including cash equivalent of food concession. The year 1958 brought in the Award of the All-India Industrial Tribunal (Colliery Dispute) which altered the wage structure and introduced

several new elements of wages. To fit in with the altered wage structure, the basis of Provident Fund deduction was changed to total emoluments from the beginning of 1958 and since then the rate of contribution to the Coal Mines Provident Fund has been $6\frac{1}{4}$ per cent of total emoluments with a matching contribution by employers. In view of the present rising spiral of prices accumulations even at this rate cannot be considered adequate and the question of raising the rate further to $8\frac{1}{3}$ per cent of total emoluments is already on the anvil.

Benefits.

(i) The Coal Mines Provident Scheme ensures compulsory savings thereby helping workers to have a care-free and honourable old age. Along with a high yield in the shape of compound interest the accumulations enjoy absolute safety and are protected against being charged or assigned and even from attachment by courts. As the Fund is recognised under the Indian Income Tax Act, 1922, the higher paid staff get rebate in respect of their Provident Fund contribution from Income-tax. The major attraction of course is the additional amount earned by the members as employers' contribution.

(ii) The full amount including employers' contribution and interest therein is refunded in the event of death, permanent physical or mental infirmity, superannuation and retrenchment. In view of the arduous nature of work in coal mines is 50 years. In other cases the member's own contribution with interest therein is refunded along with the employer's contribution according to the following scale:—

Period of membership.	Percentage of employer's contribution and interest therein refundable.
Less than 3 years ..	25 per cent.
3 years or more but less than 5 years.	50 per cent.
5 years or more but less than 10 years.	75 per cent.
10 years or more but less than 15 years.	85 per cent.
15 years or more ..	100 per cent.

(iii) Accumulations of deceased members are paid to their nominees and in the absence of a valid nomination to the surviving members of the deceased subscriber's family or to the legal heirs. Till the end of February, 1962, a sum of Rs. 3.08 crores has been refunded to members and nominees/heirs of deceased members in settlement of 1,50,158 claims,

Contribution and Investment thereof.

Contributions to the Fund and the administrative charges are required to be paid by the employers to the Fund by the 15th of every month. The average amount received as contribution every month comes to about Rs. 36 lakhs and so far a sum of about Rs. 26.65 crores has been received in the Fund on account of employees' and employers' contributions. All receipts of the Fund are pooled in the Fund's current Account no. 1 maintained with the State Bank of India, Dhanbad, which is the only banker of the Fund. Leaving a reasonable amount for payment to outgoing members and administrative expenses, the balance is invested exclusively in Central Government Securities according to the following patterns:—

Pattern of investment.	Amount.	Yield per cent per annum.
National Plan Savings Certificates	10%	4.25
Treasury Savings Deposit Certificates.	10%	4.00
Other medium term securities ..	10%	about 3.75
Long-term securities ..	70%	about 4.00

Up to the end of February, 1962, Government securities for a total nominal value of Rs. 29,61,69,400 have been purchased by the Fund.

Penal Provision.

(i) Contraventions of the provisions of the Act and the schemes are penal. Defaulting employers are liable on conviction to imprisonment up to six months and or fine up to Rs. 1,000. The unpaid amounts are recoverable as arrears of land revenue. Although the Act does not now provide for levy of damages from employers on belated payment of the dues of the Fund, it has been possible through convincing arguments put forth by the officers of the Fund to persuade the revenue officials to agree to the levy of interest on grounds of equity since the Fund is under a statutory obligation to credit interest in the accounts of its members notwithstanding the delay in realising the amounts. A proposal for amending the Act with a view to levying damages is already under Government's consideration and once this amendment comes through, it will have a salutary effect on defaulting employers. In most cases resulting in conviction, courts have been pleased to award compensation out of the fines imposed in terms of section 545 of the Cr. P. C. The total amount of compensation awarded by courts up to the end of February, 1962 comes to Rs. 1.41 lakhs. Besides this a sum of Rs. 54,000 has been realised out of courts from defaulting as incidental charges in cases where prosecutions were withdrawn after getting all contraventions set right.

(ii) Defaults committed by employers are not insignificant as would be evident from the following statistics:—

Prosecution launched till the end of February, 1962—2,063.

Recovery proceedings instituted till the end of February, 1962—1,319.

This is despite the policy that legal action is treated as the last resort at it causes, expense, delay and leaves behind a trail of bitterness.

Administrative Set-up.

The Fund vests in and is administered by a Tripartite Board of Trustees consisting of the representatives of employers, workers and the Central and the State Governments. The Coal Mines Provident Fund Commissioner is the Chief Executive Officer of the Fund. The scheme is administered from one Central Office at Dhanbad although Inspectors of the Organisation are stationed in various coalfields. They conduct regular inspections and report infringement of the scheme to the Commissioner. Some controlling functions, however, vest in the Central Government. The Board consists of six representatives of the Central Government, six representatives of the Employers and six representatives of the Employees. The Secretary of the Government of India, Ministry of Labour and Employment, New Delhi acted as the Chairman of the Board.

Through intensive publicity of the scheme done with the help of various kinds of audio-visual aids it has been possible to dispel the suspicion from the minds of the workers that the amount contributed by them was a net loss never to be refunded to them. Prompt settlement of claims has instilled greater confidence among them and the scheme has gained immense popularity among colliery workers and the employers alike. Employers now appreciate that the scheme has been helpful in stabilising labour force in the industry. No doubt there are still difficulties but the Organisation is proceeding with a firm step to resolve them.

COAL MINES BONUS SCHEME.

The Coal Mines Bonus Scheme, 1948 was framed by the Central Government under the Coal Mines Provident Fund and Bonus Schemes Ordinance, 1948. This scheme is applicable to the coal mines situated in the States of West Bengal, Bihar, Madhya Pradesh and Orissa and came into force on the 12th May 1947, in respect of coal mines in West Bengal and Bihar and on the 10th October, 1947, in respect of the coal mines in Madhya Pradesh and Orissa. Subsequently, the Ordinance was replaced by the Coal Mines Provident Fund and Bonus Schemes Act, 1948, which also gave legal validity to the principal scheme.

The object of the bonus scheme is to ensure regularity of attendance and provide a stable labour force in the coal mining industry by arresting the tendency to absenteeism and resort to illegal strikes.

The schemes are applicable to employees in coal mines whose basic earnings do not exceed Rs. 300 per month, excluding persons employed as (i) *malis*, sweepers or domestic servants; (ii) in State collieries (now under the control of the National Coal Development Corporation Ltd.) on pay and under conditions of service which are similar to those obtaining in Railway establishments or under conditions of service which entitle them to pension under the Civil Rules, and (iii) as labourers of a contractor for building, brick-making or tile-making.

The employees covered by these schemes are entitled to be paid every quarter a bonus equal to $\frac{1}{3}$ of their basic earnings in that quarter provided certain conditions relating to attendance and strikes are fulfilled. The bonus is payable within two months of the expiry of the quarter.

The following is the qualifying period of attendance for earning bonus in Bihar:—

54 days in a quarter in case of underground miners and other underground piece workers and 66 days in a quarter in the case of other workers.

No bonus is payable to the employees who participate in an illegal strike in respect of the quarter in which such strikes take place. However, if an illegal strike is called off within 48 hours of its commencement, the amount of bonus that would have fallen due to the employees but for their participation in that strike, has to be credited by the employer to the "Reserve Account of the Coal Mines Provident Fund". During the year (1960) 785 collieries employing a labour force of approximately 5,44,716 were covered by the schemes in India. Separate figures for Bihar are not mentioned in the brochure "Annual Report on the working of the Coal Mines Bonus Schemes", Government of India, Ministry of Labour and Employment.

The Coal Mines Bonus Schemes were amended in the following respect in 1960:—

- (1) With a view to check causes of short payment and non-payment of bonus widely prevalent in Coal Mines Bonus Scheme, 1948, requiring the management of the collieries to make payment of bonus in the presence of the Inspector if he apprehends some irregularities in the payment of bonus and requires the employer to make payments in his presence at the time and place to be submitted by him.
- (2) For utilising the amount of unclaimed bonus lying with the employers for the general welfare of the employees in coal mines, as recommended by the 5th session of the

Industrial Committee on Coal Mining held in August, 1956, a provision was made in the scheme making it obligatory on the part of the employer to deposit the unclaimed bonus after a period of six months from the end of a particular quarter to the reserve account established under the schemes. This provision was given retrospective effect from the quarter commencing from the 1st January, 1958.

Enforcement Machinery.

Prior to August, 1952, the administration of the main Bonus Scheme, 1948 was the responsibility of the Coal Mines Provident Fund Commissioner. From August, 1952, the enforcement of the main scheme as well as other schemes has been entrusted to the industrial relations machinery. The Chief Labour Commissioner, Deputy Chief Labour Commissioner, Regional Labour Commissioners, the Coal Mines Provident Fund Commissioner, Conciliation Officers, Labour Inspectors, Junior Labour Inspectors and the Coal Mines Provident Fund Inspectors were appointed as Inspectors under the Coal Mines Provident Fund and Bonus Schemes Act, 1948 for the enforcement of the schemes. The field work is done mostly by the Labour Inspectors, Junior Labour Inspectors and the Provident Fund Inspectors. The Regional Labour Commissioners and Conciliation Officers also visit the collieries in their jurisdictions to check the work of the Inspectors and to assist them as and when necessary.

Legal action is taken against the defaulting employers by way of prosecution for breaches of the provisions of the schemes or by way of filing certificate cases for recovery of bonus payable to the workmen as an arrear of land revenue.

The following tables are appended and show the working of the schemes for the year 1959-60:—

- (a) Frequency of inspections of collieries.
- (b) Number of inspections, irregularities and the time taken for rectification.
- (c) Submission of bonus, number of workers employed, amount of bonus paid.
- (d) Average number of workers employed.
- (e) Number of 'show cause' notices issued.
- (f) Disposal of prosecution and appeals.
- (g) Particulars of certificate cases filed and decided.
- (h) Disposal of applications for declaring strikes to be illegal.
- (i) Progress of enforcement.

TABLE A.

Statement showing frequency of inspections of Collieries Statewise (1959-60).

Serial no.	State.	No. of collieries.	Number of Collieries inspected.					Total no. of Collieries inspected.
			Once.	Twice.	Thrice.	Four times.	More than four times.	
1	2	3	4	5	6	7	8	9
1	Bihar	501	1	11	37	196	256	501

TABLE B.

Statement showing number of inspections, irregularities and the time taken for rectification, etc. (1959-60).

Serial no.	Region.	No. of inspections carried out.	No. of irregularities detected.	No. of irregularities pending rectification at the end of the previous year.	No. of irregularities rectified within—						Total. irregularities contested by employers.
					No. of irregularities rectified out of those pending at the end of the previous year.	3 months.	6 months.	9 months.	12 months.		
1	2	3	4	5	6	7	8	9	10	11	12
1	Dhanbad	3,052	13,522	1,558	1,405	7,025	2,631	1,768	1,098	12,522	12

TABLE C.

Statement showing submission of bonus returns, number of workers employed, amount of bonus paid, etc. (1959-60).

Serial no.	Name of State.	No. of Collieries in the State.	Quarterly average no. of bonus returns received.	Average no. of workers employed in collieries submitting the returns	Average no. of workers who were paid bonus.	Total amount of bonus paid to the workers during the year.	Total amount of bonus remaining unpaid.	Remarks.
1	2	3	4	5	6	7	8	9
1	Bihar	501	427	2,90,042	1,30,467	1,73,63,689.81	3,39,815.50	

TABLE D.

Statement showing the average (for 4 quarters) number of workers employed those who qualified for bonus etc. (1959-60).

Serial no.	Name of the State.	No. of Collieries.	Categories of workers.	Average no. of workers employed.	Average no. of workers who qualified for bonus.	Percentage of collieries 5 to 6.	Remarks.
1	2	3	4	5	6	7	8
1	Bihar	501	(i) Supervisory and clerical	9,659	9,052	93.7	
			(ii) Underground	1,45,128	58,474	40.3	
			(iii) Others	1,35,255	90,640	67.0	

TABLE E.

Statement showing the number of 'show cause' notices issued and the result thereof (1959-60).

Serial no.	State.	No. of 'show-cause' notices—				Result of 'show-cause' notices.			
		Pending at the beginning of the year.	Issued during the year.	Total.	No. of pursued.	No. resulting in legal action.	Pending correspondence at the end of the year.	Total.	
1	2	3	4	5	6	7	8	9	
1	Bihar	112	200	312	173	21	118	312	

TABLE F.

Statement showing the disposal of prosecutions and appeals (1959-60).

Serial no.	State.	No. of prosecutions pending at the beginning of the year.	No. of prosecutions filed during the year.	Disposal of prosecutions.			Total amount of fine imposed, or awarded to Department.	No. of appeals filed during the year.	Disposal of appeals.					
				No. of cases resulting in acquittal.	No. of cases resulting in conviction.	No. of cases resulting in con-			By department.	By employer.	By employee.	Filed by department.	No. allowed.	Filed by employers.
1	2	3	4	5	6	7	8	9	10	11	12	13	14	
						Rs. nP.	Rs. nP.							
1	Bihar	99	17	2	30	4,425.00	625.00	1	1	1	1	1	..	

TABLE G.

Statement showing the particulars of certificate cases filed and decided during the year (1959-60).

Name of State.	No. of cases pending at the beginning of the year.	Cases decided during the year.								No. of cases pending at the end of the year.	Disposal of appeals.				Remarks.	
		No. of cases.	No. of employees involved.	Amount of bonus.	Claim- ed.	Award- ed.	Amount of interest.	No. of cases.	Filed by Department.		No. allowed.	No. dis- missed.	Filed by employers.	No. allowed.		No. dis- missed.
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15		
Rs.nP. Rs.nP.																
1 Bihar	26	13	3*	50	2,867.36	†	..	..	36	..	..	1†	..	..

*As the payments were made to the workers, the 3 certificate cases were struck off.

†As the payments were made to the workers, the 3 certificate cases were struck off and hence the question of awarding the claimed amount of Rs. 2,887.36 nP. does not arise.

‡Still pending.

TABLE H.

Statement showing the disposal of applications for declaring strikes to be illegal (1959-60).

State.	No. of applica- tions pending at the beginning of the year.		No. of applica- tions filed during the year.		No. of applications decided during the year.			Appeals against Regional Labour Commissioner's decisions.			Remarks.	
	No. of applica- tions pending at the beginning of the year.	No. of applica- tions filed during the year.	Holding the strike to be legal.	Holding the strike to be illegal.	With- drawn.	Total.	No. of applica- tions pending for de- cision at the end of the year.	No. pending at the beginning of the year.	No. filed during the year.	No. decided during the year.		
1	2	3	4	5	6	7	8	9	10	11	12	13
Bihar	5	22	1	6	13	20	7	..	..	..	..	..

THE COAL BOARD : ITS CONSTITUTION, FUNCTIONS AND ACTIVITIES (DHANBAD).*

Introduction.

The Coal Mining Committee, appointed by the Government of India in 1936 to suggest measures necessary for ensuring greater safety in coal mines, strongly recommended the introduction of stowing operations in mines in the interest of safety and also conservation. In pursuance of this recommendation, the Coal Mines Safety (Stowing) Act, 1939 was enacted "to make further provisions for safety in coal mines by taking measures to facilitate or require therein carrying out of the operation known as stowing, and to provide for the creation of a fund for the assistance of such operation". In explaining the objects and the reasons of the Coal Mines Safety (Stowing) Bill it was stated that on examination of the recommendation of the Committee (Coal Mining Committee, 1937) in consultation with the Provincial Governments and interests concerned, the Government of India felt that, for the present, at any rate, the main objective of any proposal should be to secure the safety of the worker. Such proposal would incidentally, result in a certain amount of conservation, but safety should be the primary objective and the bill was designed to give effect to this proposal.

Thus the purpose and function of the Coal Mines Safety (Stowing) Act were limited to the adoption of measures and grant of assistance, out of the stowing fund, for safety only. The Government of India was at that time obviously not prepared to undertake legislation for securing the conservation of coal resources, even when they accepted the view of the Coal Mining Committee that measures for conservation, particularly of the coking coal, were urgently required in view of the limited reserves of such coal.

The Indian Coalfields Committee, 1946 in Chapter VII of its report very strongly recommended extension of the functions of the then Coal Mines Stowing Board so as to include conservation within its purview. The above recommendation of the Indian Coalfields Committee was endorsed by the Committee on Conservation of Metallurgical Coal, 1950 and also by the Working Party for the Coal Industry, 1951. The Committee on Conservation of Metallurgical Coal, while commenting on the Coal Mines Safety (Stowing) Act, stated in paragraph 44 of its report as follows:—

"It will be apparent, therefore, that the scope of the Act is limited to stowing for safety only and not for conservation. We feel most strongly that the time has come for enforcing stowing for conservation purposes also. All our witnesses were unanimous in the opinion that the scope of stowing should include the conservation aspect. We, therefore, recommend that the Coal Mines Safety (Stowing) Act be enlarged to cover

* Contributed by the C. B. (P. C. R. C.).

stowing for conservation and to include conservation of all coking coal falling in the Selected Grades or Grade I in the first instance."

Similarly, the Working Party, 1951 recommended amendments of the Coal Mines Safety (Stowing) Act so as to include measures necessary for conservation in addition to those being administered for safety.

As a result of the recommendation of the various Committees, the Coal Mines Safety (Stowing) Act, 1939 was repealed, and the Coal Mines (Conservation and Safety) Act, 1952 was enacted in its place with more comprehensive and enlarged functions covering the various aspects of safety and conservation in coal mines.

Constitution of the Coal Board.

The Coal Board has been constituted under the Coal Mines (Conservation and Safety) Act, 1952 and is a body corporate. It consists of a Chairman and such number of other Members, not exceeding six, as appointed by the Central Government.

Powers and Functions of the Coal Board.

(A) *Powers of the Central Government.*—Under the Coal Mines (Conservation and Safety) Act, 1952 the Central Government has acquired powers to exercise such control and take or cause to be taken such measures as it may deem necessary or proper for the purpose of maintenance of safety in coal mines or for conservation of coal, particularly—

- (a) to require colliery managements to undertake such measures, including stowing, as may be found necessary for safety;
- (b) to undertake measures, including stowing for conservation or beneficiation of coal in the case of coking coal mines; and
- (c) to levy such duty of excise, not exceeding one rupee per ton, as may be fixed from time to time for all coal and coke despatched, and also an additional duty of excise, not exceeding Rs. 5 per ton in the case of coking coal of Selected Grade 'A' and Selected Grade 'B', and not exceeding Rs. 2 per ton in the case of Grade I, as may be fixed from time to time.

(B) *Delegation of Powers to the Board by the Central Government.*—It has been provided in the Act that the Central Government may, by a general or special order, delegate to the Coal Board all the above powers or such of the above powers as the Government thinks fit; and the Government has already delegated most of the above powers to the Board.

(C) *Functions of the Board.*—In addition to the aforesaid powers delegated by the Central Government, the Coal Board has the following main functions:—

- (i) To undertake directly or cause to be executed through its agencies such measures as it considers necessary or desirable for the furtherance of the objects of the Act.
- (ii) To grant assistance, out of the fund created under the Act, for stowing or other protective measures considered necessary for safety or conservation.
- (iii) To meet expenses for carrying out different measures which are considered essential for effective prevention of spread of fire or inundation of water in a coal mine.
- (iv) To grant assistance for washing or blending of coal undertaken under the orders of the Board.
- (v) To meet expenses in the prosecution of research work connected with safety, conservation or utilisation of coal.
- (vi) To grant loans to the colliery managements for the purchase and installation of stowing, blending, washing or any other beneficiation plant proposed to be set up in the interest of conservation.
- (vii) To draw samples for the determination of the quality of coal and to grant grade accordingly. No coal is allowed to be despatched or sold under the Colliery Control Order, 1945, unless it has received a Grading Certificate.
- (viii) To fix the maximum quantity of production of coal from a particular seam or seams in the coal mines producing specified type and quality of coal.
- (ix) To require the management of a coal mine to adopt the method of working in the mine as prescribed by the Board for the purpose of ensuring conservation and safety.
- (x) To control depillaring operations in a mine without stowing and the splitting of pillars as a final mining operation which, in its opinion, may result in undue loss of coal, spread of fire, etc.
- (xi) To restrict supply of coking coal of any grade or grades to specified consumers so as to advance the cause of conservation by proper utilisation.
- (xii) To require any steel works, coke ovens, blast furnace, etc., to undertake blending of coal for conservation.
- (xiii) To regulate the opening and re-opening of coal mines or seams so as to conform such opening or re-opening to the country's requirements of a particular type of

coal and to utilise the transport now available in the best manner. While granting permission for opening or re-opening of a mine conditions are imposed to ensure scientific and proper method of mining in the interest of safety and conservation.

- (xiv) To control the closing of a coal mine. The owner of a mine is required to give notice at least three months before the proposed date of closure. This enables the Board to examine the mine in its different aspects to ascertain the effect of closure so far as conservation of coal is concerned. Steps to secure the interest of conservation are taken before the mine is allowed to close down.
- (xv) To require, through its technical officers, a colliery management to take such protective measures, including stowing, in the mine as considered necessary, if the extraction or reduction of pillars is likely to cause crushing of pillars or premature collapse or otherwise endanger human life or the mine, or if adequate provision against outbreak of fire or flooding has not been made.

(D) *Advisory Committee*.—Under the Act the following Advisory Committees have been constituted to advise the Central Government or the Board in regard to any matter connected with the administration of the Act, in respect of which their advice is sought:—

- (1) Technical Advisory Committee (Mining) consisting of the Chief Mining Engineer, Coal Board, as Chairman; Additional Chief Inspector of Mines; Chief Mining Adviser, Railway Board; Deputy Director, Geological Survey of India; and two representatives of the Mining Industry as Co-opted Members. One of the Inspecting Officers of the Coal Board acts as the Secretary to the Committee.
- (2) Advisory Committee on Stowing comprising a member of the Board as Chairman; Chief Inspector of Mines; Director, Central Fuel Research Institute, and two representatives nominated by the Indian Mining Association and one representative each by the Indian Mining Federation and Indian Colliery Owners' Association.

Activities of the Board.

Apart from the functions of supervision of, and control on, the different aspects of mining, namely, opening of a mine, its method of working, its depillaring operation, the Board plays a very important role in the adoption of safety and conservation measures in collieries by granting monetary assistance for stowing. It also, in

some special cases, undertakes directly or through its agencies measures, called protective measures, for controlling fires, inundation and such other mishaps which would otherwise prove disastrous to the mines and their workmen. As stated above, a fund called Coal Mines (Conservation and Safety) Fund, has been constituted under the Act, to which the proceeds of a cess at the rate of Rs. 1.68 per ton of coal and soft coke despatched and Rs. 2.52 per ton on hard coke despatched, is credited by the Central Government.

(A) *Voluntary Stowing*.—As explained above, assistance is paid for voluntarily carrying out stowing operations for safety or conservation, the present rate being as follows:—

- (a) For hydraulic stowing, 100 per cent of the total cost of stowing subject to a maximum of Rs. 2.50 per ton for sand or mixture of sand and ash and Rs. 3.00 per ton for crushed material; and
- (b) for hand packing 100 per cent of the total cost subject to a maximum of Rs. 2.75 per ton of material.

The quantities of material stowed and the amounts of assistance paid under this heading are as follows:—

Year.	Quantity of	Amounts of assistance.		
	material.			
	Tons.	Rs.	a.	p.
1941-42	26,71,298	1,93,694	15	0
1942-43	27,09,167	2,77,079	14	0
1943-44	30,76,794	6,31,906	4	0
1944-45	38,04,629	6,56,657	3	0
1945-46	35,84,867	6,65,282	8	0
1946-47	36,22,191	18,06,478	13	0
1947-48	35,19,349	12,05,898	4	0
1948-49	36,62,044	15,63,217	8	0
1949-50	38,96,071	47,27,370	6	0
1950-51	41,21,244	40,22,158	11	0
1951-52	45,62,199	54,63,370	11	0
1952-53	49,21,695	60,77,013	0	0
1953-54	49,63,550	61,61,138	10	0
1954-55	51,23,628	45,54,117	12	0
1955-56	52,61,790	61,41,423	15	0
1956-57	52,17,144	71,87,348	8	0
1957-58	64,96,541	81,68,278		94
1958-59	70,37,014	1,06,57,503		72
1959-60	69,36,625	1,51,51,590		54

Thus it may be seen that with the encouragement given by the Board in the shape of monetary assistance the quantity of stowing has steadily increased and is now more than two and a half times what it was in 1941-42. The amount of assistance paid by the Board has also increased from Rs. 2,77,079-14-0 in 1942-43 to Rs. 1,51,51,590.54 in 1959-60.

(B) *Protective Works.*—To the south of the Jharia Railway Station and to the east of the Jharia Bazar, there is an area which is now commonly known as the Jharia Fire Area. To a new comer in this field this area, which is covered all over by a thick layer of sand, generally poses a question as to how the sand has drifted and overlaid such a large area so near to the Jharia Bazar. The deposit of sand is not a geological phenomenon; it is the result of blanketing the area with sand in the course of many years to control the fire and to protect the Jharia Bazar and the other neighbouring mines.

This fire broke out in the year 1931, and within a few years developed into such a threatening proportion that serious danger to the Jharia-Pathardih Railway line, Jharia Bazar and to a number of neighbouring mines were apprehended. Before the constitution of the Coal Mines Stowing Board, the Railway authority took some steps to halt the progress of the fire towards the Jharia Station. In 1940, the Board undertook the measures to control the fire, and has since blanketed with sand (brought in wagons from the Damodar River) a large area measuring about 70 acres and has incurred an expenditure of roughly Rs. 15 lakhs. With all these measures the fire is now under control. Similar measures have also been taken in some other areas commonly known now as Jeenagora Area, Karijore Area and Bagdigi Area. In the Jharia and Suratand areas, if the above measures had not been taken by the Board, the devastation that would have been caused by these fires would have been colossal. The Jharia town as well as many neighbouring mines would have been wiped out.

In addition to these major steps taken for the control of these big fires, the Board undertakes directly the control of, or grants monetary assistance for dealing with, many fires that break out every year. As the years pass by, the number of fires, particularly in the old goaves and in the quarry debris where slack coal had recklessly been thrown during the years of depression in the market and also during the Second War, increases. Therefore, the effective control of these fires has become one of the important recurring activities of the Board.

To prevent or, in some cases, to minimise the danger of inundation the Board also executes protective measures either directly or through the agency of the collieries.

For the execution of the aforesaid protective measures the Board has annually incurred expenditures as given below:—

			Rs.	a.	p.
1941-42	..	..	2,87,271	3	0
1942-43	..	..	1,82,500	4	0
1943-44	..	..	2,00,559	3	0
1944-45	..	..	2,38,899	7	3
1945-46	..	..	6,98,639	8	6
1946-47	..	..	4,62,054	9	9
1947-48	..	..	5,51,671	14	9
1948-49	..	..	7,53,890	14	0
1949-50	..	..	6,75,787	4	6
1950-51	..	..	5,92,707	7	6
1951-52	..	..	6,46,536	5	0
1952-53	..	..	6,94,214	8	0
1953-54	..	..	3,59,848	2	0
1954-55	..	..	3,39,300	11	0
1955-56	..	..	1,47,392	12	6
1956-57	..	..	3,48,705	8	0
1957-58	..	..	4,63,287.69		
1958-59	..	..	5,59,202.12		
1959-60	..	..	4,52,532.69		

(C) *Restriction of the Output of Coking Coal.*—Coking coal is a type of coal which on high temperature carbonisation, yields metallurgical coke of a quality required for the reduction of iron ore to pig iron in a blast furnace. Our country has limited reserves of good quality coking coal. In the past, little attention was paid to the conservation of this irreplaceable national asset, without which the manufacture of iron and steel, so very necessary for the progress of a country, will come to a standstill. Uncontrolled methods of selective mining, practised in the past, have seriously depleted the reserves of good quality coking coal which has till recently been consumed by any consumer demanding it, irrespective of the purpose for his demand, even when it has been felt for long that the use of this type of coal should be limited only to the manufacture of hard coke for the blast furnace. From 1948 the production of coking coal showed a marked tendency to increase resulting in its increased use for non-essential purposes. In some of the cases the output of this type of coal was enhanced by a method mining not conducive to conservation. It was, therefore, considered essential to arrest the tendency towards increase in the production of coking coal and to that extent, to save its wastage. With that end in view the decision of the Coal Board to peg or freeze the

production of Selected 'A' and 'B' grades of coking coal at a fixed level came into force from 1952. In 1953, the production of Grade I and Grade II coking coals was also controlled. As a result of these measures the production of coking coal had instead of increasing, registered a slight fall as may be seen from the following:—

Year.	Selected A and B Grades. (Million Tons).	Grade I (Million Tons).	Grade II (Million Tons).
1949	7.24	2.88	2.59
1950	7.39	2.35	2.80
1951	7.89	2.80	2.99
1952	7.75	3.69	3.06
1953	7.17	3.67	2.89
1954	7.21	3.66	2.74
1955	6.95	3.70	2.66

Thus, the above measures have to a certain extent succeeded in conserving coking coal by limiting wastage while mining and by reduction of its use for purposes other than for the manufacture of hard coke. It should be mentioned, however, that as the new iron and steel units planned by the Government of India go into commission, the production of coking coal will need to be increased.

(D) *Control on the Opening and Re-opening of Coal Mines.*—This measure to regulate the opening or re-opening of mines has been considered necessary so as to control production of coals of different qualities and in different coal-bearing areas in accordance with the needs of the country and to conform to the transport available. Until the new steel plants had been installed any increase in production of coking coal was considered not only undesirable but definitely against the national interest. Moreover, to rationalise the transport encouragement for opening new mines in various regions, as near to the consumers as possible, is also necessary. This control also enables the Coal Board to examine the proposed lay-outs with a view to the introduction of scientific mining, particularly from the conservation aspect. For all these reasons the opening and re-opening of a coal mine is strictly controlled by the Board, and permission is given only after consideration in detail of the merits of each case.

(E) *Study of Working Conditions of Coal Mines.*—On reference from the Coal Board the Technical Advisory Committee (Mining), constituted under the Coal Mines (Conservation and Safety) Act, inspects collieries and reports on their condition, the methods of working and the necessity of measures, including stowing, from the point of view of safety and conservation. To start with, such

references were made to the Committee in connection with the mines producing Selected 'A' and 'B' Grades of coking coal. Of the collieries inspected and reported upon by it, the Technical Advisory Committee (Mining) have recommended in some 20 cases introduction of stowing for ensuring safety and minimising loss of coal during extraction and the Board has accepted their recommendations in all these cases. In pursuance of these recommendations, Orders under section 7 (2) (b) of the Coal Mines (Conservation and Safety) Act, 1952 have been issued by the Board on these collieries to make early arrangements for adoption of stowing which is considered as one of the most positive methods of effecting conservation of coal.

(F) *Control of Depillaring Operations.*—Under the Coal Mines Conservation and Safety Rules mine managements are required to give notice of their intention of commencing depillaring operations in a seam. Each such notice is examined thoroughly from the technical angle by the Board's technical officers and on their reports the Board decided whether to give or withhold permission for depillaring. In a number of cases permission has been accorded on certain conditions considered necessary in the interest of safety and conservation. This control is aimed at reducing loss of coal during its extraction and eliminating the adoption of cheap wasteful methods of mining for the immediate benefit to the owner.

(G) *Coal Washing.*—Coal washing is another method by which the reserves of good quality coking coal for the use by the iron and steel industry can be augmented. While washing of coal is practically in general application in the western countries, it is still in its infancy in our country. So far 7 (seven) washeries have been set up—two by M/s. Tata Iron & Steel Company, Limited at Jamadoba and West Bokaro, one by M/s. Lodna Colliery Company, Limited at Lodna, one by the National Coal Development Corporation, Limited at Kargali, one by the Associated Cement Companies, Limited at Nowrozabad and two by the Hindusthan Steel, Limited at Dugdha and Durgapur. Till some years back, there was a general impression that Indian coals were not generally, washable. But the washability tests carried out in the recent years have proved that coals of quite a good number of seams are washable, though the economics might not be very favourable because of lower percentage of yield. In March, 1953, the Coal Board appointed a Committee to study and report on certain aspects of coal washing in India. A comprehensive report was submitted by the Committee with a wealth of details in the report in October, 1954, since when coal washing has become a very "live" issue. It has been now recognised that to serve the expanding iron and steel industry it is imperatively necessary to improve by washing the quality of lower grades of coking coal and thus to augment the country's reserves of good coking coal. The Ministry of Heavy Industries and Steel is now engaged on the consideration of the question of installation of washery plants of

necessary capacities so as to wash sufficient quantity of coal to feed all the projected steel plants in the Third and the Fourth Five-Year Plans.

(H) *Subsidy to Collieries Handicapped by Various Adverse Factors.*—The Board also grants subsidy to collieries specially handicapped by various adverse mining factors. Such subsidy is admissible to collieries handicapped by one or more of the following factors :—

- (a) Gassy nature of coal mines.
- (b) Depth of shafts.
- (c) Inclination of seams.
- (d) Pumping cost.
- (e) Thinness of seams.
- (f) High transportation cost from pit-head to rail head.

In regard to the various adverse factors the present rates of assistance are as follows:—

Rate of assistance per ton of coal.

	Coking and blend- able coal used for metallurgical purposes.	Non-coking Coal.
	Rs.	Rs.
(a) Gassy nature of coal mines (subject to additional expenditure being incurred by collieries under this head).	0.80	0.60
(b) <i>Depth of shafts.</i> —No assistance is admissible in the case of vertical shafts of less than 500 feet. In respect of vertical shafts which are more than 500 feet in depth, assistance is admissible for each 100' of depth or part thereof over the first 500 feet.	0.06	0.04
(c) <i>Inclination of seams.</i> —While no assistance is granted where the true gradient is less than 1 in 3, for seams with 1 in 3 or steeper true gradients, assistance is admissible.	0.24	0.18

	Coking and blend- able coal used for metallurgical purposes.	Non-coking Coal.
	Rs.	Rs.
(d) <i>Pumping cost.</i> —No assistance is granted in cases in which the cost of pumping is less than Re. 1 per ton of coal raised.		
(i) Where the cost of pumping exceeds Re. 1 per ton but does not exceed Rs. 2 per ton of coal raised assistance is admissible.	0.12	0.10
(ii) Where the pumping cost exceeds Rs. 2 per ton of coal raised, assistance is admissible.	0.25	0.20
(e) <i>Thinness of seams.</i> —No assistance is admissible where a seam is thicker than 5 feet.		
(i) In case of seams of thickness exceeding 3'-6" but less than 5 feet assistance is admissible.	0.60	0.50
(ii) In case of seams of thickness equal to or less than 3'-6" assistance is admissible.	1.20	1.00
(f) <i>High transportation cost from pit-head to rail-head.</i> —Assistance is admissible only in cases where coal is despatched by rail and the distance between pit-head and the nearest available loading point is 3 miles or more. In such cases assistance is granted at a rate not exceeding 10 nP. per ton per mile or part thereof in respect of the distance in excess of the first 3 miles.		

This scheme of subsidy does not, however, apply to collieries in Assam and Andhra Pradesh.

(1) *Mining Research Station.*—It was appreciated by the Board that to take proper measures to ensure greater safety in mines, better mining methods, etc., a Mining Research Station should be established. An Expert Committee was, therefore, set up to draw up the necessary proposals; but when these proposals were submitted to the Government of India it was decided that the Mining Research Station should be set up under the aegis of the Council of Scientific and Industrial Research in collaboration of the Coal Board, and that the Board would make a substantial financial contribution to the Mining Research Station and would have a measure of control through its nominees on the Governing Body of the Institution.

The Board had, however, its own research department to carry out research mainly on problems connected with stowing. A good number of valuable results were obtained through the research carried out by the Department and some of these results were made public for the benefit of the industry some years back. Since 1959, the Research Wing of the Coal Board has been transferred to the Mining Research Station, Dhanbad.

GENERAL.

In the above paragraphs some of the important activities of the Board have been briefly set out. The objects of the enactment of the Coal Mines (Conservation and Safety) Act and of the constitution of the Coal Board, namely, to ensure conservation of coal and safety in mines, are so wide as to include all the aspects of mining from its inception when a pit is sunk to its closure when the pits are sealed off.

DEVELOPMENT OF SAFETY LEGISLATION IN INDIAN MINES.

Although the mining industry in India is over hundred years old, the first concrete proposal for the inspection and regulation of mining operations in India came in 1890 from the Secretary of State, Lord Cross who while forwarding a copy of the proceedings of the Berlin Conference in 1890, asked the Government of India to consider the advisability of undertaking legislation for the inspection of mines and regulations of employment therein of women and children. As a first step, the Government of India appointed in 1894 an Inspector of Mines (Mr. James Grundy) within the organisation of the Geological Survey of India, to inspect the mines and to make recommendations on the type of regulations needed. In his first report to Dr. King, the then Director of Geological Survey of India, Mr. Grundy stressed the need for passing of a short set of Mines Regulation Act which amongst other things would provide for the establishment of special rules having the legal standing as the Act itself. Briefly the Act was to provide for notices of opening, etc.,

of mines and accidents, minimum age for boys and girls employed underground, ambulances, management and supervision and safety matters. Special rules for coal and other minerals were to provide for additional safety matters including report of inspection of all parts of mines and machinery.

Following up the first report of the Inspector of Mines (Mr. James Grundy), the Government of India appointed in 1895 a committee to frame general rules applicable to mines or groups of mines, and to specify the heads on which legislation was desirable and the provisions which were to be made under each of the heads. The committee submitted its report early in 1896.

In 1897, a disaster of large magnitude occurred in the Kolar Goldfields (in Mysore State) in which 52 persons were killed in a shaft accident. This was followed in 1899 by a mine fire in Khost Coal Mine in Baluchistan (now in Pakistan) in which 47 persons were killed. The finalisation of mining legislation was, therefore, expedited; and Mines Act was enacted in 1901 and brought into force the same year. The Mines Act which came into force on 22nd March, 1901 covered all mineral excavations over 20 ft. in depth.

The main features of the first Mines Act were as follows:—

- (i) Inspectors were empowered to enter and inspect mines, and to enquire into accidents, etc.
- (ii) The employment of competent managers in mines was required; Managers' Competency Certificates were instituted.
- (iii) The Government was empowered to frame rules, etc., for regulating work in mines.
- (iv) Penalties were prescribed for the contravention of various provisions.

The Bureau of Mines Inspectorate entrusted with the enforcement of the Mines Safety Legislation was started on January 7, 1902 in Calcutta with one Chief Inspector and two Inspectors. The headquarters of the Department of Mines was shifted to Coalfields (Dhanbad) in 1908.

Rules framed under the Mines Act, 1901 required *inter alia* the provision of two outlets, maintenance of plans, proper lighting and ventilation, etc., and laid down precautions to be taken against noxious gases and smokes, against falls of roof and sides, inflammable gas, inundation and use of explosives, etc.

Until 1918 there were no major changes in the Rules, except those framed by the Provincial Governments under section 20 of the Indian Mines Act, 1901 relating to registration of workers and safety on surface. Two years later, a scheme was formulated for an examination and certification of subordinate officials (sirdars, etc.)

employed in the mines and this was put into effect in 1926. Before the passing of Indian Mines Act, 1923, several amendments were made to rules relating to returns and notices. The inspection of electrical installations to mines came within the purview of the Department of Mines in 1922 and an Inspector was appointed. In the same year the Government of India appointed a Committee to investigate the Coal Dust Problems in mines and the first report was published in 1932.

The Mines Act was re-enacted in 1923 with new provisions relating to hours and limitation of employment on the surface and underground. This Act, which came into force with effect from 1st July, 1924, also raised the minimum age of employment from 12 to 13 years.

New codes of regulations for coal and metalliferous mines were framed in 1926 to replace the old General Rules. New important provisions related to the submission of 'abandoned mine plans', the maintenance of adequate barriers (50 ft.) between adjacent mines and the provision of detaching hooks to prevent over-winding in shafts. Separate Rules were framed in 1924 by the Governments of Bengal, Bihar and Orissa to deal with matters concerning health and sanitation in mines.

In 1927 competency examination for mine surveyors was introduced and the employment of qualified surveyor for preparation of mines plans was made compulsory two years later.

In 1928 the Mines Act was amended, the amendments relating mainly to the limitations of working hours. In the same year, the Governments of Bengal, Bihar and Orissa approved the model code of bye-laws for coal mines governing *inter alia* the conduct of various categories of mine employees.

The Mining, Metallurgical and Geological Institute of India appointed Committees on two separate occasions to investigate mine subsidences and they in their report submitted in the year 1929 drew attention to the relation between the mining methods and the safety of works and the workers.

In 1933 certain provisions of the regulations were amended. The important new provisions related to (i) the procedure to be observed in the case of intentional flooding of a mine, (ii) the procedure to be followed in the event of a premature collapse of the working, and (iii) appointment of shotfirers in gassy mines having Sirdar's Certificate endorsed for gas testing.

In 1934 the minimum requirements for footpaths in open workings were specified.

A Royal Commission on Labour in India was appointed in 1929. The Commission in its report made a number of recommendations which were incorporated in the Act which was amended in

1935. The amended Act came into force on 1st October, 1935. The age of "child" was raised to 15 years. Provisions were also made in the amended Act for the medical examination of young persons below 17 years of age employed below ground. Also the weekly hours of work for both surface and underground were equalised to 54 and the maximum spread over on any one day for the two categories was fixed.

In 1936, a Coal Mining Committee was appointed by the Central Government with terms of reference ranging on subjects covering both safety and conservation of coal. In the following year amendments were made in the Act for ensuring the safety of workings and the establishment of rescue stations. The rescue stations were financed by a levy on coal despatches. Coal Mines Rescue Rules were enforced in 1939.

In 1935-36 there were a series of explosions and fires in coal mines resulting in heavy loss of life. The Regulations were, therefore, further amended in 1936 to 1938 to provide against dangers of inundation, premature collapse, fires, inflammable gas, coal dust, blown-out shots, etc.

In 1939 the Regulations were further amended. For stability of the workings the sizes of pillars and galleries were specified and certain restrictions were imposed for working two or more seams in close proximity and for extraction of pillars. New provision was made empowering the Inspectors to order protective works to be made to ensure stabilisation of the workings within a specified time, and in case of non-compliance, to prohibit the extraction of coal in the part of mine in which protective works were required to be done.

In 1929 a notification was issued by the Government requiring progressive elimination of employment of women working underground in course of next 10 years. The employment of women below ground was completely prohibited in 1937. This ban was temporarily lifted in 1943, but was reimposed from the 1st February, 1946.

In 1939, an Act known as Coal Mines Safety (Stowing) Act came into force and a stowing fund was created under the Act to assist schemes of stowing to prevent and control fires, collapses and surface subsidence and thus further the cause of safety (and conservation) in mines. A Board set up under the Act came into existence on 1st November, 1939.

In 1941, the Regulations were again amended. The main amendments related to the working of contiguous seams, maintenance of joint survey plans, determination of atmospheric conditions behind sealed-off fire areas and electric shotfiring in mines.

During the years between 1941 and 1950 welfare laws for the workers were enacted namely, Maternity Benefit Act and Rules, Creche Rules and Pit-head Bath Rules.

Although the 1923 Act had been amended from time to time in certain respects as mentioned earlier, the general framework had remained unchanged until 1952. It was now considered necessary to include a large number of new provisions, dealing mainly with provisions of ambulance and other medical facilities, drinking water, payment of overtime wages, grant of leave with wages, etc. The Mines Act, 1952, which applies to the whole of India except the State of Jammu and Kashmir, came into force with effect from 1st July, 1952. The Act, like all previous ones, defines in some detail the functions, powers and responsibilities of the Chief Inspector of Mines and other officers of the Mines Department.

A new set of Mines Rules was promulgated in 1955. New provisions include those relating to employment of Welfare Officers and provision of rest shelters, canteens and sanitary conveniences.

A new code of Coal Mines Regulations was prepared in view of the changed conditions, new methods of working and advances made in other countries and was enforced in 1957. These Regulations were framed keeping in view also the new developments in mining methods all over the world as well as the latest mining safety legislation of foreign countries. New provisions of the Regulations relate to machinery and plant and qualifications of persons employed in connection therewith; provisions of suitable survey instruments and preservation of field books, etc.; life of winding ropes, precautions during depillaring operations, standard of fencing, etc.

Similarly a new set of Metalliferous Mines Regulations were brought into force in 1961. These Regulations supersede Indian Metalliferous Mines Regulations, 1926, which were framed over 31 years ago at a time when the metalliferous mine industry in India was still in its infancy. The 1926 Regulations contained only a few provisions and those also of a very general and often vague nature and had proved to be totally inadequate to meet the requirements of the fast developing mineral industry. The new Regulations contain very comprehensive technical provisions regarding safety in mines in all aspects including employment of competent staff, maintenance of accurate plans and sections, means of access and egress, transport of men and material, safety in actual mining operations, precautions against fire, dust, gas, and water, ventilation and lighting, safe use of explosives and machinery.

Since the coming into force of Mines Act, 1952, certain anomalies had come to light as also difficulties in the enforcement of certain provisions such as those relating to leave with wages. Certain other amendments of the Act were also considered necessary for the proper enforcement of safety legislation in mines. Accordingly the Mines Act was amended in the year 1959 to make it more effective and up-to-date.

Coal Mines Rescue Rules, 1939 were amended in 1959 in order, *inter alia*, to provide for the opening of more number of rescue stations in the various coalfields and for the training of greater number of rescue workers. The rescue organisation for the mines renders very useful assistance to mines in the rescue of human life in emergencies like explosions, fires and inundation, and in the recovery and re-opening of sealed off areas in mines.

The safety legislation now in force in this country has been framed from the vast amount of experience of working mines in India for over 60 years, and keeping in view the latest mining legislation of foreign countries. All the interested parties, viz., the mine owners, workers, managers, supervisory staff and others were consulted and their views given full consideration before the legislation was brought into force.

Adequate safety legislation is the foundation on which the structure of mines safety is built. In order to keep pace with the changing conditions and new safe practices which come to light as a result of research and experience both in this country as well as in foreign countries, the Chief Inspector of Mines from time to time issues circulars to the mine managements with a view to bringing such practices to their notice for adoption, as far as practicable. When sufficient experience has been gained in complying with these recommendations and it is considered that such a provision is applicable to most of the mines action is initiated to incorporate it in the regulations in due course.

CHAPTER VI.

BANKING, TRADE AND COMMERCE.

INDIGENOUS BANKING.

The village *mahajan* or *sahukar* or the money-lender was the normal banker before organised banking institutions came into existence.

His rate of interest was usually high but was variable according to circumstances. The credit facility was easily available. Very often a part of the capital would be deducted as interest in advance. The *mahajan* was ordinarily a man of the village or a neighbouring village. He might have been the *zamindar* or a big cultivator or the village grocer. Non-payment of the dues would have been a social stigma.

The urban areas of Dhanbad have developed in recent years and there has hardly been any indigenous banking there. Some of the commercial firms or the Marwari *gaddis* have had banking business either through *hundis* or regular freezing of accounts. But such cases are rare. The colliery areas, however, have had indigenous bankers for giving credit in itinerant Afghan sellers (*Kabuliwalas*) of blankets, etc. Usually they advance loan at a high interest but without any security. Recently some Sikh traders have also been advancing loans. Some of the Agarwala and Marwari families have also taken to banking in a small way, but only for giving loans and foreclosing them and grabbing the mortgaged property.

GENERAL CREDIT FACILITIES, INDEBTEDNESS AND MONEY-LENDERS.

Sources of general credit facilities now available in the district comprise the professional money-lenders, big agriculturists, amateur money-lenders, traders, banks and lastly the State.

Regarding usury it may be said that this has been controlled to some extent by legislation but not totally. The private money-lenders hardly show any sign of disappearing. In the district of Dhanbad, the modern banking organisation has not yet percolated to the rural areas. The money-lenders have been occupying a prominent position both in the rural and urban areas.

The Government of Bihar passed the Bihar Money-lenders Act in 1938 to protect the borrowers from the professional money-lenders. By this Act a money-lender is required to get himself registered and obtain a license for carrying on his business. He is also obliged to

maintain regular accounts in respect of each loan transaction showing the outstanding amount of the principal, interest and the payments. The Act has fixed the rate of interest as follows:—

Secured loan.	Unsecured loan.
1. Simple interest—9 per cent per annum	12 per cent per annum.
2. Compound interest—Prohibited	Prohibited.

In spite of the Act the money-lenders are known to be realising an exorbitant rate of interest by underhand means. A part of the loan is usually deducted and this is not shown in the account. There are reasons to believe that there are still many unregistered money-lenders. The number of registered money-lenders is also on the increase.

The table below supplied by Registration Department will show the annual statement on the working of the Bihar Money-lenders Act for Dhanbad district from 1959-60 to 1961-62.

The following families carried on money-lending business of Rs. 20,000 and above during the year 1961-62* :—

Name of families.	Places where business was carried on.	Amount of business in rupees.
1. Niranjan Lal Bagira o/o Bhim Raj Bagira, Jharua.	Jharua town ..	.. 20,000 and above.
2. Smt. Karna Jaiswal, wife of Shoo Shankar Jaiswal, Sindri.	Sindri town ..	.. 20,000 and above.
3. Jaishankar Mehta, son of Bhagwati Lal Mehta, Jharua.	Jharua town ..	.. 20,000 and above.
4. M. L. Rathor Lodha Rathor, Dhanbad.	Dhanbad town ..	.. 20,000 and above.
5. Smt. Dubhi Devi, wife of Gir-dhari Lal, Jharua.	Jharua town ..	.. 20,000 and above.
6. Dhansukh Lal, Ltd., Jharua ..	Ditto ..	.. 20,000 and above.
7. Braj Mohan Kejriwal, son of Gurudayal Kejriwal, Jharua.	Ditto ..	.. 20,000 and above.
8. Ram Parekh and Company, Ltd., Jharua.	Ditto ..	.. 20,000 and above.
9. Promod Chandra Sen, son of Hardas Sen, Dhanbad.	Dhanbad town ..	.. 20,000 and above.
10. Jagdish Chandra Maghera, son of Kesholal Maghera, Jorapokhar, Dhanbad.	(1) Jorapokhar (2) Dhanbad town ..	.. 20,000 and above.

* The statement has been compiled from data given by the District Sub-Registrar, Dhanbad.

Name of families.	Places where business was carried on.	Amount of business in rupees.
11. Kedarnath Lall, son of Maunallal Jhunhunwala, Dhanbad.	Dhanbad town ..	20,000 and above.
12. Gopalji Madhavji, son of Mudhavji, Dhanbad.	Ditto ..	20,000 and above.
13. Nand Kishore Chokhani, son of Hanuman Chokhani, Jharla.	Jharla town ..	20,000 and above.
14. Ram Nath Durga Prasad, son of Durga Prasad Agarwalla, Dhanbad.	Dhanbad town ..	20,000 and above.
15. Kedarnath Kejriwal, son of Shoolall Kejriwal, Dhanbad.	Ditto ..	20,000 and above.
16. Balbhadra Singh, son of Rajballav Singh, Jharla.	Jharla town ..	20,000 and above.
17. Smt. Anari Devi, wife of Naraindas Agarwal, Jharla.	(1) Jharla town .. (2) Dhanbad town.	20,000 and above.

Besides these private agencies for lending, the Government also lend to the cultivators *taccavi* and other loans and there are Co-operative Societies which also lend money to cultivators. The proportion of borrowing from the different agencies to the total borrowings of cultivators is calculated to be as follows:—

Credit agency.	Proportion of borrowing from each agency to the total borrowings of cultivators.
	Per cent.
1. Government	3.3
2. Co-operative	3.1
3. Relatives	14.2
4. Agricultural money-lenders	24.9
5. Professional money-lenders	44.8
6. Traders and commission agents	5.6
7. Landlords	1.5
8. Commercial Banks	0.9
9. Others	1.8
Total ..	100.0

Number of licensed Money-lenders.

Year.	At the beginning of the year.		Who were registered for the first time during the year.		Whose licenses were renewed during the year.		Whose licenses were cancelled during the year.	
	Urban.	Rural.	Urban.	Rural.	Urban.	Rural.	Urban.	Rural.
1	2	3	4	5	6	7	8	9
1959-60	..	937	188	142	73	43	15	..
1960-61	..	500	603	116	140	20	30	..
1961-62	..	536	729	100	141	24	35	..

Amount of loan advanced during the year.

Year.	Whose five-year terms of licenses expired during the year.		At the close of the year.		With security.		Without security.	
	Urban.	Rural.	Urban.	Rural.	Urban.	Rural.	Urban.	Rural.
1	10	11	12	13	14	15	16	17
					Rs.	Rs.	Rs.	Rs.
1959-60	150	55	972	221	13,20,395	2,03,717	1,30,724	28,208
1960-61	100	134	536	729	10,00,076	14,63,922	66,318	79,764
1961-62	85	117	575	788	56,11,211	7,66,008	40,006	69,300

INCIDENCE OF INDEBTEDNESS.

The economy of the average family in the rural areas is based on the quantity of land or on the earner's personal wages in case he or she has no land. In a district like Dhanbad where the parts to the north of Grand Trunk Road cover rather unfertile lands, it will not be correct to have any absolute categorisation according to the quantity of land as the indicator of economic incidence. Broadly, however, cultivators may be divided into three categories, viz., (i) those who own up to six acres of land; (ii) those who own seven to twenty *bighas* of land and (iii) those who have land above 30 *bighas*. Besides the cultivators, there is a large class of landless agricultural labourers. Landlordism has now been abolished. Most of the erstwhile landlords have now taken to some service or professions as contractors or business, etc.

The economic conditions of these categories of men excepting those who have more than thirty *bighas* of land do not admit of any good scope for saving. On the other hand indebtedness is also a normal feature of these categories.

The marked feature of the economy of the district in the rural areas is the possibility of getting occupation in collieries or in the industries. This possibility brings in an additional income and saves many families from chronic indebtedness. It may be noted that some of the villagers particularly residing near colliery or industrial areas have utilised their possibility of savings properly and some of them have invested in constructing houses of better type or acquiring lands. Many of these villagers are small or large contractors or are associated with the collieries in some shape or other. Some of them have combined some amount of trade and commerce along with their cultivation. Many of the villagers whether they are cultivators or landless people, sell their physical labour in the collieries or in the industrial areas. At the same time certain prominent traits such as improvidence and drunkenness have often been an obstacles to save more and to liquidate the incidence of indebtedness. No detailed study was made in the villages regarding the incidence of indebtedness among the various income-groups of people and the observations made have a general but not an absolutely accurate applicability. There has been no investigation by any enquiry committee. It may, however, from cursory investigation that was made, be observed that about 50 per cent of the cultivators particularly of smaller status are in some sort of indebtedness. In some cases the indebtedness is possible to be liquidated but owing to the habits and social demands, the indebtedness remains. The indigenous population of the district is now, more or less, confined to the rural areas while the urban areas are full of people who have come to Dhanbad from outside the district or the State for business or other purposes. Particular mention has to be made as to the agricultural indebtedness of the tribals. An enquiry was made in some of the tribal villages in Tundi area. The investigation suggests that indebtedness is a normal feature of almost all the tribal villages that was studied.

The impact of the Community Development Project on a tribal area was studied. It was found that there was little or no economic improvement of the tribals in spite of the efforts of the Community Development Projects. There has been also a certain amount of wrong planning. Japanese method of paddy cultivation was sought to be introduced in some of these tribal villages although this method of paddy cultivation requires proper irrigation, utilisation of fertilisers and more individual care of the cultivation. The initial expenditure for Japanese method of paddy cultivation is almost double that of the indigenous method of paddy cultivation. In the tribal villages where study was made the Japanese method of cultivation was found to have been introduced without success. There was

hardly any facility for irrigation, financial backing for purchase of fertilisers and it was a mistake to try in a routine manner the introduction of this method of cultivation. On the other hand, development of coalfield was a line that had a personal appeal to the tribals. Every tribal family would like to keep poultry and would like to improve the breed of poultry if improved breed pullets or eggs were supplied and instructions provided. But it was found that very few eggs had been distributed. Rearing of better type pigs was another line that might have been more quickly adopted by them. But there was hardly any attempt to do this. It was found that the grain-golas had helped to some extent but the aid was not adequate.

So far as the incidence of indebtedness in the urban areas is concerned the picture is somewhat different. On one hand there are possibilities of savings and actual accumulation of savings among certain groups of people who are residents in the district and on the other hand there are large classes of men who could be described as middle class or lower middle class, who have a very little chance of savings and indebtedness is a common feature in their economy. The group of men vaguely described as the common men could be taken to have a monthly income up to Rs. 100 per month. Another group is represented by them whose income is from Rs. 100 per month to Rs. 200. The third group will be those whose monthly income is Rs. 200 to Rs. 500 and the last group covers those whose income is Rs. 500 and above. The terms like the common man, lower middle class, upper middle class and the rich are rather vague and apt to be misunderstood.

Dhanbad district has the highest number of towns according to 1961 Census. It is a peculiar fact that the towns are full of men who are not the original inhabitants of the district or even of the State. Many of them came for business, interest in collieries and mines or as contractors. Most of them have stayed back and have built palatial houses, acquired large chunks of lands and have now become permanent settlers. But for purposes of marriages and other social obligations they occasionally go back to their original home districts. It is, however, a very significant fact that it is these persons who have mostly ploughed back the money they have earned into other business interests of the district. They have not as a class carried away the money to their home districts. Most of the large business interests are now in their hands but they cannot be accused of the charges of self-aggrandisement. On the other hand these businessmen, colliery and mining kings have introduced what may be vaguely described as a self-generating economy and have helped to build up the industrialisation of the district. Dhanbad district is a typical example of indigenous agricultural economy passing into an industrial economy. The earlier annals show the economy to be absolutely pivoted to a little bit of land and a primitive method of cultivation by the tribals who also used to help themselves with a little bit of scratching

of the soil and collection of a little coal locally consumed or marketed in the neighbourhood. But that economy has now completely changed. Although agriculture engages the bulk of population, it has not been able to give them sufficiently large meals a day. The agricultural economy of the primitive tribals of Dhanbad district is not to be found practically in the neighbourhood of any urban area. Even the tribal villagers do not depend on agricultural economy alone. The tribals as mentioned before have fully taken advantage of the collieries and mining interest although mostly as manual workers. The opening up by the surveyors and the geologists was followed by the advent of the entrepreneurs, technical skill and the capitalists. This led to more of urbanisation as every large industrial or colliery or mineral interest led to a certain amount of urbanisation. The result is seen today in the fact that Dhanbad district is the only district in the State of Bihar that is jotted with urban areas almost throughout the southern portion of the Grand Trunk Road in spite of the fact that the district is extremely small in area. It has not been possible for more urbanisation in the portion to the north of the Grand Trunk Road because of the contour of the land and the paucity of collieries or mineral interests.

While discussing the question of indebtedness in the urban areas we have to mention the fact that the business magnets of the district have been extremely liberal with their purse strings. During the last great war they had liberally helped the war efforts. In the present tension due to the Chinese (1962) they have also been liberal in their contributions. Again this district has usually led in banking the savings for defence efforts. It is true that wars may mean particular acceleration of certain types of business interests bringing in more money but it does not necessarily follow that the people who make money out of such emergencies will always give their money in charity. It is again these richer folk in Dhanbad district that have been liberal in starting libraries, schools, colleges, hospitals and such other institutions. The Income-tax Department has a very large clientele within the district and a good percentage of them pay the super tax. These facts have to be borne in mind when the incidence of indebtedness of the district in the urban areas is to be considered.

It is, however, a fact that such men whose income is much above the four categories as we have suggested, form a very small moiety of the urban groups. It is true that this small group is a very important factor in the economy of the urban areas but their impact on the other sections has not always been for their substantial economic incidence. It is correct that these small groups through their business, colliery and mining interests have provided ample opportunities for employment but the level of wages has not been very large.

It is better to give an analysis of the economic incidence of the different groups that have been suggested.

The standard of living of the low income-group (up to Rs. 100) people in urban areas is very low. Rickshaw pullers, *darwans*, *chowkidars* and office peons constitute the major portion of this group.

To ascertain the incidence of indebtedness among the men of this group, the family budget of a rickshaw puller was taken during investigation. The average number of his family members is eight—one male, two females and five children aged about 2, 4, 6, 8 and 10 years respectively. The entire unit of the family comes to 5. The husband and wife are the earning members. Their total monthly earning comes to about Rs. 145 but actually the income is Rs. 100 because the rickshaw puller has to pay Rs. 45 to the owner of the rickshaw as monthly rent. The income from rickshaw-pulling varies from month to month. The items of monthly expenditure are as follows:—

- (1) Rickshaw rent—Rs. 45.00.
 - (2) Rice—Rs. 23.50.
 - (3) *Atta*—Rs. 17.25.
 - (4) Pulses—Rs. 5.00.
 - (5) Oil—Rs. 4.50.
 - (6) Vegetables—Rs. 5.00.
 - (7) Medicine (average monthly)—Rs. 5.00.
 - (8) Entertainment—Rs. 5.00.
 - (9) Clothing (average in a month)—Rs. 5.00.
 - (10) Fuel—Rs. 5.00.
 - (11) Lighting—Rs. 2.00.
 - (12) House Rent—Rs. 10.00.
 - (13) Intoxication including tea, *biri*, *pan*, etc.—Rs. 35.00.
 - (14) Miscellaneous—Rs. 5.00.
- Total—Rs. 172.25.

It may be mentioned that there is no expenditure on items like milk and *ghee*, fruits, education and domestic services, etc. It is apparent from the above figures that the rickshaw puller has to take loan to meet the expenditure. He is in debt. He indulges himself in many kinds of vices, viz., drinking, etc.

In the second income group the income varies from Rs. 100 to Rs. 200. Clerks, teachers of primary and middle schools, industrial labourers and mine workers constitute the major portion of this group. The family budget of a teacher and a mine worker was taken to ascertain the incidence of indebtedness.

(a) *Family budget of a teacher*.—The average number of his family members are husband, wife, dependent (1) and two sons aged

about 10 and 12 years respectively. The entire unit of the family comes to 5. The total monthly income is Rs. 140 per month, i.e., Rs. 90 from pay and Rs. 50 from tuition.

The items of normal monthly expenditure are as follows:—

- (1) Rice—Rs. 26.
- (2) *Atta*—Rs. 10.
- (3) Pulses—Rs. 7.
- (4) Mustard oil—Rs. 8.
- (5) Vegetables—Rs. 15.
- (6) Fish and meat—Rs. 5.
- (7) Entertainment—Rs. 5.
- (8) Medicine (average monthly)—Rs. 10.
- (9) Transport—Rs. 10.
- (10) Milk—Rs. 20.
- (11) *Pan*—Rs. 5.
- (12) Electric charges—Rs. 3.
- (13) Coal—Rs. 4.
- (14) Sugar—Rs. 6.
- (15) Spices—Rs. 5.
- (16) Miscellaneous—Rs. 30.
- (17) House rent—Rs. 20.
- (18) Clothing—Rs. 5.

Total—Rs. 194.

The above figures show that the teacher has to take loan to meet the expenditure or to deprive the family of some basic wants.

(b) The family budget of a mine worker of Jharia colliery was taken during investigation. The average number of his family members is 9—two males, two females and five children aged about 3, 6, 8, 10 and 12 years respectively. The entire unit of the family comes to 7. There are three earning members in the family, i.e., two males and one female.

Their total monthly earning comes to about 300 per month. The items of monthly expenditure are as follows:—

- (1) Rice—Rs. 39.
- (2) *Atta*—Rs. 20.
- (3) Pulses—Rs. 20.
- (4) Mustard oil—Rs. 10.
- (5) Spices—Rs. 5.
- (6) Vegetables—Rs. 30.

- (7) Entertainment—Rs. 20.
- (8) Clothing (average monthly)—Rs. 10.
- (9) Fish and meat—Rs. 20.
- (10) Intoxication (including *biri*, *pan*, wine, *etc.*)—Rs. 60.
- (11) Gambling—Rs. 30.
- (12) Transport—Rs. 20.
- (13) Festivals (average monthly)—Rs. 15.
- (14) Cosmetics—Rs. 10.
- (15) Interest of loan taken—Rs. 20.
- (16) Miscellaneous—Rs. 40.

Total—Rs. 367.

There is no expenditure on items like milk and *ghee*, fruits, education and domestic services, *etc.* It is apparent from the above figures that the family is in debt.

Dhanbad is an industrial district and the non-agricultural population outnumber the agricultural population. About 51 per cent of the total population derive their livelihood from non-agricultural occupations. As there has been no rural or urban survey to ascertain the incidence of indebtedness, it is difficult to reach a definite conclusion as to the percentages of people in debt either in rural or urban areas of the district.

Random observation was made to enquire into the reasons responsible for indebtedness, the most important of which are as follows:—

- (1) The low wages prove hardly adequate to support the families of the people of urban and rural areas and to meet their social obligation.
- (2) The migratory character of the workers is also responsible for indebtedness to some extent.
- (3) Marriages, festivals, funerals and other social customs also claim expenditure which prove too much for the meagre income.
- (4) The readiness and facility with which the usurious money-lenders too eager to take advantage of their miseries and privations advance loans to the workers contribute to increase their indebtedness.
- (5) Irregular employment also in many cases may be responsible for workers' indebtedness.

It may be noted that the vast majority of the industrial workers in the coal industry and other industries in Dhanbad district are unskilled and generally illiterate, ignorant and socially very backward classes of the community who often migrate to coalfields because of

economic pressure. Because of their illiteracy and ignorance, they are easily susceptible to expenditure and fall into the hands of unsocial elements who take advantage of their innocence, take a major portion of their hard-earned income by encouraging them to indulge in several kinds of vices. Due to such vices they are forced to borrow and purchase goods on credit from the money-lenders and shop-keepers at exorbitant rates.

(c) On an enquiry from the middle class people it was found that generally their income varies from Rs. 200 to Rs. 500 per month. Under this category the family budget of a middle class family, i.e., of an upper division old teacher of D.A.V. Higher Secondary School in Dhanbad town was taken. The family consists of husband, wife, one adult dependent and three children aged about 4, 7 and 10 years respectively. The entire unit of the family comes to four and half. The total monthly income is Rs. 350. The family budget was found to consist of the following items of expenditure:—

Stuff.				Prices in rupces.	
1. Rice	24.50
2. <i>Atta</i>	14.50
3. Pulse	11.25
4. Vegetables	45.00
5. Mustard oil	11.00
6. Spices	5.00
7. Milk	30.00
8. Sugar	10.00
9. Fish and meat	10.00
10. Tea	7.00
11. Fuel	10.00
12. Cloth (average monthly)				..	30.00
13. Medical expenses (average)			15.00
14. Education	15.00
15. Transport (average)	15.00
16. Entertainment (average) including festivals and journeys twice a year.					40.00
17. House rent including electricity	50.00
18. Water from <i>bhariwallas</i>			10.00
19. Miscellaneous	40.00
Total				..	363.25

The above table indicates that the family members do not save any amount rather they live hand to mouth and sometimes they have

to take loan from others on interest. Credit is often resorted to for purchasing clothes and consumption of goods and repayment is generally made on instalment basis.

The standard of living of the people particularly in the vicinity of Dhanbad and Jharia town is worse than that in rural areas. It cannot be denied that the middle class cost of living in Dhanbad region is higher than that of Calcutta.

There is an acute dearth of inhabitable rented houses in coal-fields and even if some houses are available, they are on exorbitant rent which is beyond the means of a middle class family. Again, in absence of proper water supply in most of the places in the district, cost of water mostly drawn by *bhariwallas* from the neighbouring wells or water taps is sometimes exorbitant for the earning of the family. On the average, a middle class family has to spend from Rs. 10 to Rs. 15 per month for getting water which generally goes up to Rs. 20 per month during summer months.

Secondly people in the urban areas of coalfields have to do a lot of travelling every day because most of them live away from the market, railway station, schools, colleges and hospitals.

Due to transport cost, education, medical facility and entertainments are very costly. Usually the cost of transport to the cinema house and back is more than the value of the cinema ticket in the district. All other services are relatively costlier in coalfield area. The upward movement of the prices of the essential commodities does not show any decline. The cumulative consequence of all this has been that the material condition of the middle class people has deteriorated considerably.

In the present Welfare State the incidence of taxation has got to go on increasing and there will be more of rise in expenditure over fooding, clothing, educational and medical expenses, etc. The State is bound to impose more and more taxes to provide for the development projects and to firmly set up a Socialistic State. Unless the structure of the family budget is radically changed there may be much more of indebtedness in the district.

It may also be noted that the district has also a number of persons of upper middle class or upper class whose income is Rs. 500 and above with a comfortable economic condition. Such persons are usually businessmen, colliery owners, top doctors and highly paid Government servants. The standard of living of the upper class people with higher income in the urban areas is high. These persons are not suffering from any load of indebtedness.

Under this category the family budget of an Assistant Public Relations Officer at Maithon was taken.

The average number of the family members of the Assistant Public Relations Officer who is a lady is 5—husband, wife, one child of $1\frac{1}{2}$ years of age and two servants. The entire unit of the family comes to $4\frac{1}{2}$. The husband and wife are the earning members.

The husband of the Assistant Public Relations Officer is a second class colliery manager and his earning is Rs. 500 per month. The Assistant Public Relations Officer also draws Rs. 500 as salary per month. Hence the total income comes to Rs. 1,000 per month. The family budget was found to consist of the following items of expenditure:—

- (1) Rice—Rs. 30.
 - (2) *Atta*—Rs. 10.
 - (3) Pulses—Rs. 10.
 - (4) Mustard oil—Rs. 11.
 - (5) Vegetables—Rs. 35.
 - (6) Fish, meat and eggs—Rs. 60.
 - (7) Milk—Rs. 65.
 - (8) Entertainment—Rs. 20.
 - (9) Cosmetics—Rs. 30.
 - (10) Transport—Rs. 30.
 - (11) House rent including electric charges—Rs. 65.
 - (12) Payment to servants—Rs. 100.
 - (13) Coal—Rs. 20.
 - (14) Washerman—Rs. 25.
 - (15) Sugar—Rs. 10.
 - (16) *Ghee*—Rs. 20.
 - (17) Drinking and smoking—Rs. 25.
 - (18) Cloth—Rs. 60.
 - (19) Insurance (Life Insurance only)—Rs. 180.
 - (20) Miscellaneous—Rs. 50.
 - (21) Spices—Rs. 10.
- Total—Rs. 865.

The above figures indicate that they save some money out of their income and they are not in debt. Besides Insurance, they have a saving of about one hundred rupees per month.

Taking all the points mentioned above into consideration, it may be noted that in spite of the general indebtedness of the average man, there may be a fair margin of savings but we have not got sufficient data to calculate the annual savings in the different sectors in the district. There has been an increase in bank deposits and Life Insurance Companies, etc.

Regarding usury it may be said that this has been controlled to some extent by legislation but not totally. It is, however, correct to think that the recent changes in the legislation and the provision

of more credit facilities have had their contribution and the Afghan money-lenders who used to visit the villages and the towns every winter have not been very prominent in the last one decade or so.

CO-OPERATIVE CREDIT SOCIETIES AND BANKS.

Before the adoption of the recommendations of the Rural Credit Survey Committee, the Co-operative Movement was treated more as a non-official movement and little Governmental assistance was given. The departmental officers had only the power to inspect the societies and to suggest remedies for improvement. But after the adoption of the recommendations of the Rural Credit Survey Committee in 1958, the Co-operative Movement took a different form. Government began to give aid in the shape of contribution of share capital in the primary and apex institution and also managerial assistance. Since then the number of societies, their membership and share capital have shown a marked increase.

The following figures supplied by Co-operative Department will show the number, affiliated and non-affiliated of different types of Co-operative Societies in the district:—

Types of Societies.	Sadar subdivision.			Baghmara subdivision.		
	Affiliated.	Non-affiliated.	Total.	Affiliated.	Non-affiliated.	Total.
1	2	3	4	5	6	7
1. Multipurpose Co-operative Societies.	118	27	145	109	27	136
2. Large-sized Co-operative Societies.	4	..	4	3	..	3
3. <i>Vyapar Mandal</i> Co-operative Societies.	4	..	4	2	..	2
4. Credit Co-operative Societies	38	54	92	10	17	27
5. Consumers' Co-operative Stores.	12	28	40	6	8	14
6. Teachers' Co-operative Stores	1	5	6	..	3	3
7. Urban Co-operative Societies	3	2	5	..	..	..
8. Joint Farming Co-operative Societies.	..	..	..	4	..	4
9. Labour Co-operative Societies	..	..	..	2	..	2
10. Harijan Co-operative Societies	3	..	3	1	..	1

Types of Societies.	Sadar subdivision.			Baghmara subdivision.		
	Affiliated.	Non-affiliated.	Total.	Affiliated.	Non-affiliated.	Total.
1	2	3	4	5	6	7
11. Housing Co-operative Societies	2	..	2	..	..	..
12. Weavers' Co-operative Societies	5	1	6	6	6	12
13. Forest Co-operative Societies	..	1	1	..	..	..
14. Fishermen's Co-operative Societies.	2	1	3	1	1	2
15. <i>Sarbodaya</i> Co-operative Societies.	1	..	1	..	..	..
16. Dairy Co-operative Societies	3	..	3	..	..	..
17. Oilmen's Co-operative Societies	4	3	7	2	1	3
18. <i>Charmakar</i> Co-operative Societies.	2	1	3	3	4	7
19. Basket making Co-operative Societies.	3	2	5	2	..	2
20. <i>Dhankutai</i> Co-operative Societies.	2	..	2	1	..	1
21. <i>Ambarcharkha</i> Co-operative Societies.	1	..	1	..	..	..
22. Lohakar Co-operative Societies	4	..	4	1	1	2
23. <i>Kumbhkar</i> Co-operative Societies.	3	..	3	..	..	..
24. Bristol Co-operative Societies	1	..	1	..	..	..
25. Silk-rear Co-operative Societies.	1	3	3	..	..	..
26. Carpenter Co-operative Societies.	..	..	..	1	..	1
27. <i>Mahila Udyog</i> Co-operative Societies.	1	..	1	1	..	1
28. Palimgur Co-operative Societies	1	2	3	..	..	..
29. <i>Newar</i> Co-operative Societies	..	..	..	1	..	1
30. Soap making Co-operative Societies.	2	1	3	..	..	..
31. Tailoring Co-operative Societies.	..	1	1	1	..	1

The following figures will show the progress of the Co-operative Movement in Dhanbad district from 1961 to 1962 :—

Types of Societies.	Years.	Number.	Members.	Paid-up capital.	Reserve fund.	Owned fund.	Deposits.	Loans.	Working capital.	Loans outstanding at the beginning.
1	2	3	4	5	6	7	8	9	10	11
				Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.
1. Central Co-operative Bank, Ltd.	1961	1	370	2,32,095	59,747	3,12,442	13,02,488	68,986	16,83,916	3,77,186
	1962	1	409	2,56,094	59,826	3,15,920	15,33,207	65,033	19,14,160	3,87,189
2. Agricultural Co-operative Societies other than large-sized Co-operative Societies.	1961	213	10,360	99,375	41,128	1,40,503	12,843	3,29,166	4,82,642	3,61,481
	1962	227	11,204	1,25,765	47,809	60,574	32,350	5,02,575	7,08,439	5,54,595
3. Marketing Societies other than new primary marketing societies organised under the plan.	1961	4	103	83,501	5,061	93,502	..	56,952	1,50,434	9,711
	1962	6	145	1,04,710	19,476	1,24,186	..	1,03,267	2,32,453	7,951
4. Large-sized Co-operative Societies.	1961	7	1,134	50,089	5,357	55,446	446	57,889	1,13,781	36,386
	1962	7	1,358	53,422	13,160	66,582	282	60,438	1,33,302	33,936
5. Consumers' Stores	1961	17	3,165	51,309	33,012	84,321	20,093	18,979	1,23,393	..
	1962	18	3,322	54,547	1,212	55,839	9,080	15,517	1,04,711	9,640
6. Urban Co-operative Societies	1961	35	7,345	3,90,691	68,541	4,79,232	13,70,832	14,923	18,64,967	..
	1962	50	8,650	4,83,598	1,04,114	5,87,712	8,85,280	19,175	14,92,167	11,27,616

1	2	3	4	5	6	7	8	9	10	11
7. Housing Co-operative Societies.	1961	2	258	5,455	111	5,566	..	24	5,590	..
	1962	2	258	5,455	111	5,566	..	24	5,590	..
8. Weavers' Co-operative Societies.	1961	11	720	5,387	246	5,633	6,234	29,808	41,675	1,109
	1962	11	684	4,314	224	4,538	5,483	21,182	31,203	1,271
9. Milkmen's Co-operative Societies.	1961	3	189	4,695	3,496	8,191	..	6,552	14,743	2,408
	1962	..	..	..	..	..	..	..	..	..
10. Other Industrial Co-operative Societies.	1961	22	329	6,355	1,134	7,929	..	18,842	20,597	..
	1962	35	716	7,808	1,372	9,180	1,036	28,873	42,678	15,317
11. Fishermen's Co-operative Societies.	1961	3	87	392	..	392	..	..	392	..
	1962	3	87	392	..	392	..	..	392	..
12. Teachers' Co-operative Societies.	1961	1	11	975	..	..	..	..	975	..
	1962	1	11	975	..	..	..	..	975	..

The following figures will throw considerable light on the work and progress of the Co-operative Societies, Multipurpose Co-operative Societies in the district of Dhanbad :—

Name of the Community Development Block.	No. of Societies.		No. of Members.		Loans paid during the year to individuals.		Loans repaid during the year to individuals.		Loans due at the end of the year.		
	1961.	1962.	1961.	1962.	1961.	1962.	1961.	1962.	1961.	1962.	
1	2	3	4	5	6	7	8	9	10	11	
1. Dhanbad Block	..	76	93	11,150	12,572	5,480	50,381	21,723	22,004	13,029	41,406
2. Gobindpur Block	..	62	63	2,158	2,378	20,183	53,027	27,343	68,447	58,308	42,888
3. Nirsa Block	..	44	47	4,395	5,024	59,092	96,342	47,657	38,335	37,174	89,181
4. Tundi Block	..	31	36	1,350	1,500	36,446	52,562	27,205	47,799	47,113	51,875
5. Topchanchi Block	..	42	42	2,021	2,025	26,768	62,442	20,567	79,146	75,158	58,458
6. Chas Block	..	44	47	2,687	2,910	38,953	2,32,536	38,599	93,598	61,698	2,00,635
7. Chandankiary Block	..	40	41	2,126	2,205	31,060	28,895	16,749	58,872	52,331	22,544
8. Balliapur Block	10	..	424	..	6,100	..	..	..	6,100

Joint Farming Co-operative Societies.

Joint Farming Co-operative Societies are a new venture. During the Third Five-Year Plan the target for this district is 20 for the whole period. Till 1962 only four Joint Farming Co-operative Societies in Baghmara subdivision with 184 members and share capital of Rs. 2,240 have been organised. They are at an initial stage and not much can be said about them without an appraisal.

Central Co-operative Bank.

The Central Co-operative Bank is the pivot of co-operative banking and credit. All the co-operative societies will be affiliated to it for the purpose of supervision, guidance and credit facility. This bank encourages institutional pattern of credit and does not extend any credit to individual persons direct. It extends finance only to co-operative institutions which in turn pass on the same to their members. This bank was established in 1923 at Dhanbad.

The following table will indicate the volume of credit facilities extended to the co-operative institutions during 1956-57 to 1961-62 by this bank:—

Year.	Amount of loans advanced in rupees.	Total demand in rupees.	Total collection in rupees.
1956-57	1,05,288	89,292	33,412
1957-58	1,38,651	1,32,707	34,992
1958-59	1,60,687	2,30,483	1,07,211
1959-60	1,85,311	3,75,799	1,53,420
1960-61	2,40,482	4,35,015	2,23,456
1961-62	5,77,286	4,45,207	4,14,917

The main activity of the Central Co-operative Bank is to provide agricultural finance to the affiliated co-operative societies which in their turn finance their agriculturist members and give short-term and medium-term loan for productive purposes. Short-term loans are advanced to agriculturist members to meet their current production needs such as seeds, manures, etc. These loans are made available to them at short notice and are repaid within nine to twelve months. Medium-term loans are advanced for purchase of livestock, agricultural implements, etc., for a period of three to five years. The rate of interest on all kinds of loans was $6\frac{1}{2}$ per cent per annum from the ultimate borrower, i.e., the cultivators but from January, 1961 it has been raised to $7\frac{1}{2}$ per cent. Loans are advanced on the security of the landed properties of the members but such securities are not required for loans below Rs. 200. Personal securities are taken in all cases. Loans are also available from the co-operative societies to its non-agriculturist members, such as artisans up to Rs. 100 as working capital.

The following figures supplied by Co-operative Department will show the present position of Central Co-operative Bank of the district :—

Particulars.	Period.							
	1956.	1957.	1958.	1959.	1960.	1961.	1962.	
1	2	3	4	5	6	7	8	
1. Paid-up share capital	Rs. 15,534	Rs. 26,554	Rs. 42,199	Rs. 1,47,490	Rs. 1,51,349	Rs. 2,52,695	Rs. 2,64,774	
2. Reserve Fund and other funds	Rs. 3,720	Rs. 49,068	Rs. 49,200	Rs. 49,302	Rs. 49,356	Rs. 59,748	Rs. 61,998	
3. Borrowed capital	Rs. 3,56,481	Rs. 4,54,477	Rs. 7,07,239	Rs. 9,64,483	Rs. 11,40,672	Rs. 13,71,475	Rs. 19,88,785	
4. Working capital	Rs. 3,75,785	Rs. 5,30,099	Rs. 7,98,638	Rs. 11,61,284	Rs. 13,41,377	Rs. 16,93,918	Rs. 23,15,557	
5. Loans outstanding at the close of the year.	Rs. 1,16,315	Rs. 1,89,620	Rs. 2,91,720	Rs. 3,45,779	Rs. 3,83,627	Rs. 3,87,089	Rs. 7,46,266	

BANKS.

The statement below shows the Banking Offices in Dhanbad district other than the Co-operative Banks in 1962:—

Location.	Name with year of establishment.	Nature of offices.
1. Dhanbad	1. State Bank of India (1924)	Branch Office.
	2. United Bank of India (1945)	Ditto.
	3. United Commercial Bank, Ltd. (1961).	Ditto.
2. Jharia	1. State Bank of India (1952)	Pay Office.
	2. Central Bank of India (1959)	Branch Office.
	3. Punjab National Bank, Ltd. (1948)	Ditto.
	4. Bank of Bihar, Ltd. (1935)	.. Ditto.
	5. Virgi and Company Bankers (1940).	Head Office.
	6. Jharia Industrial Bank (1945)	Ditto.
3. Katrasgarh	1. Virgi and Company Bankers (1940).	Branch Office.
	2. Bank of Bihar, Ltd. (1935)	.. Ditto.

In April, 1958 "The Chotanagpur Banking Association, Ltd." went into liquidation.

These banks as usual collect the savings of the public, give loans on reasonable security and undertake the other monetary transactions as the agent of the customers in collecting and paying cheques, bills and dividends, etc. Many of the banks act as the custodians of the valuable documents and jewellery of the customers and issue various forms of easily negotiable credit instruments.

Hundi business is still continuing and is generally confined to business in foodgrains and clothes.

Colliery remittance business is done by State Bank of India at Dhanbad by discounting cheques and bills drawn at Calcutta and other places. The remittance is usually sent to the collieries in terms of cash indents of various collieries to meet their weekly requirements on account of labour payments, etc.

The Dhanbad branch of the State Bank of India, the Bankers' Bank is a continuation of the branch of the old Imperial Bank which was opened in 1924. The branch of the State Bank of India which took over the branch of the Imperial Bank was established in 1955. All the branches of this bank in the district undertake

all commercial banking transactions as agents of the Reserve Bank of India, conduct the Government cash work, provide remittance facilities to banks, extend, exchange and remittance facilities to the public and pay, receive, collect and remit money and securities on Government account, etc.

From the 9th October, 1961, a full-fledged Public Debt Office with safe custody facilities has started functioning in Patna. This Public Debt Office has taken over from the Public Debt Office of Calcutta under the Reserve Bank of India, the management of all Central and State Government loans, the interest of which is payable at places within the State of Bihar.

SAVINGS IN THE DISTRICT.

With the expansion of Life Insurance in rural areas in recent years the rural population of the district is getting slightly insurance-minded. These insured persons through payment of premiums make some savings. The average cultivator with small holding or the landless labourers have no savings. As for the big cultivators they have a margin to save and normally make investments in buying gold ornaments or in advancing loans. The ex-landlords of rural areas have now learnt to put the savings in the banks.

In urban areas the service-holders under the Government, local bodies, firms or traders and artisans have not got much margin to save unless they belong to a high income-group or have other personal sources of income like lands, house-rents, etc. The condition of the lawyers and doctors unless they have gone up high is not very enviable now. With the abolition of *zamindari*, establishment of *Gram Panchayats* and the lowering of the economic level of the common man, the lawyers have lost most of their income. The doctors too have lost much of their private practice in most cases. The opening of the Blocks with doctors is a reason. The lower middle classes have practically no means of savings. The servant classes are now better off than before but the margin of saving is very small for them also. But the big traders and merchants have the capacity to save and they do save.

PROVIDENT FUND.

Under the scheme of provident fund, permanent employees contribute a percentage of their pay to this fund. The employer also contributes an equal amount towards the provident fund account of the employee. The contribution is a kind of compulsory savings by the employee.

Holders of pensionable Government posts are allowed to contribute a certain percentage of their pay to the provident fund but the employer, viz., Government does not contribute anything towards it.

The contributor is entitled to take loan from the provident fund on occasions provided in the rules. The loan is repaid in instalments.

SMALL SAVINGS.

Small savings of the man of limited means have a great importance and the banks willingly accept small deposits. The State Government and Central Government have agencies to absorb such small savings. The State Government float loans from time to time. The Post Offices have their savings departments.

In 1961-62 there were 48 Post Offices with savings bank facilities in the district. This includes a head office at Dhanbad and six branches and 41 Sub-post Offices.

The following statement supplied by Postal Department will give the statistics of the amount deposited and withdrawn in Savings Banks during 1957-58 to 1961-62:—

Year.		Amount deposited in rupees.	Amount withdrawn in rupees.
1957-58	..	97,29,039.01	77,04,375.52
1958-59	..	1,25,35,782.82	8,70,616.89
1959-60	..	1,23,31,238.42	1,02,57,104.29
1960-61	..	1,37,77,909.52	1,87,26,092.17
1961-62	..	1,49,88,238.53	1,14,98,250.73

The figures show that the response of the public has not been very encouraging. In the rural areas the want of response may be due to the difficulty of keeping a paper-bound savings bank account book properly in a thatched hut. Prompt disbursals are not always made because the Post Office has to verify the signature which may differ. Somehow the average villager has not got much confidence in the local postal savings bank.

Any citizen who can spare even so small an amount of Rs. 5.00 can open a Post Office savings bank account at any Post Office which does savings bank work. The maximum limit of investment is Rs. 15,000.00 for an individual and Rs. 30,000.00 for a joint account of two individuals. All local authorities and co-operative societies and non-profit making institutions can also open accounts with these banks which are called public accounts. For opening a public account there is no limit to the deposit.

Interest on individual and joint accounts is allowed at the rate of 2½ per cent for the first Rs. 10,000.00 and 2 per cent on the balance in excess of Rs. 10,000.00. On public accounts interest is allowed at 2 per cent (interest is calculated for each calendar month). The interest earned on these investments is free of income-tax and super tax.

NATIONAL SAVINGS SCHEME.

The beginning of Government mobilisation of small savings in India could be traced to World War I (1914-18) when the then Government issued Postal Cash Certificates of 5 years', 7 years' and

10 years' duration. They were sold at a discount and repaid at par after the completion of the maturity period. They were discontinued a few years after the war.

During World War II (1939-43), the issue of such certificates was again introduced and even after the war they are being continued in a more intensive form because small savings from a large number of people can become a substantial item in the capital resources that are required for carrying out the Nation's Five-Year Plans.

The following categories of investment have been classified as small savings investment since 1957:—

- (1) Twelve-Year National Plan Savings Certificates issued in denominations of a minimum of Rs. 5.00 and maximum of Rs. 5,000.00 and yielding interest at 5.41 per cent.
- (2) Ten-Year Treasury Savings Deposit Certificates issued in denomination of Rs. 50.00 and Rs. 100.00 and yielding interest at 1 per cent per annum which is paid every year.
- (3) Fifteen-Year Annuity Certificates whereby accumulated savings can be invested as a lump sum and received back in monthly instalments for a period of 15 years, the rate of interest being about $4\frac{1}{4}$ per cent per month compound.

The investments under the different categories of these schemes in the district of Dhanbad for the last four years (1958-59 to 1961-62) are as follows:—

Year.			Gross investment.	Withdrawal.	Net investment.
1958-59	..	..	2.48 crores	98 lacs	1 crore 50 lacs.
1959-60	..	..	2.98 crores	1.13 crores	1 crore 85 lacs.
1960-61	..	..	[2.92 crores	1.18 crores	1 crore 74 lacs.
1961-62	..	..	3.70 crores	1.39 crores	2 crores 31 lacs.

As an inducement to savings, the Central Government have started since 1st April, 1960, a scheme of 5 years' interest free Prize Bonds eligible for participating in drawings quarterly each year till 31st March, 1965. These bonds are of two denominations, one of Rs. 5 and the other of Rs. 100. The attractive feature of the bonds is that at each draw prizes are available ranging from Rs. 50 to Rs. 7,500 for five-rupee bonds and Rs. 500 to Rs. 25,000 for 100 rupee bonds that win the draw. The investor is repaid for his investment while there is a chance for him to win a prize as well.

NATIONAL DEFENCE CERTIFICATES AND DEFENCE DEPOSIT CERTIFICATES.

Government of India have announced the following certificates to enable every citizen to invest his savings for the National Defence since November, 1962. This scheme was sponsored particularly because of the Chinese aggression since October, 1962.

National Defence Certificates.—The certificates are available at all Post Offices transacting savings bank business.

The certificates are in denominations of Rs. 5, Rs. 10, Rs. 50, Rs. 100, Rs. 500, Rs. 1,000, Rs. 5,000 and Rs. 25,000.

On maturity at the end of 12 years, the certificates will be repaid at a premium of 75 per cent of the issue price, yielding a return of 6.25 per cent per annum single or 4.75 per cent per annum compound: a certificate of Rs. 100 would fetch Rs. 175 at the end of 12 years. The interest is free of income-tax. There is a slab also if the money is withdrawn earlier.

Defence Deposit Certificates.—Deposits for the purchase of these certificates are accepted at all offices of the Reserve Bank of India, branches of State Bank of India and its subsidiaries, conducting Government treasury business and at treasuries and sub-treasuries. The interest is payable annually at $4\frac{1}{2}$ per cent per annum. It is free of income-tax.

The certificates are issued in denomination of Rs. 50 and its multiples.

The amount is returned at the end of 10 years from the date of deposit. A certificate may be encashed at any time after the expiry of one year from the date of issue.

GENERAL AND LIFE INSURANCE.

Life Insurance is a well-recognised and very useful mode of saving and safeguarding against possible risks of life.

Before the Life Insurance Corporation was formed in 1956, there were agents of a number of Life Insurance Companies like Oriental, New Asiatic, Industrial and Prudential, General Assurance, Palladium, United India, Bharat Insurance, National Insurance, Ruby General of India, Bombay Life Insurance, Metropolitan Insurance Company, etc., working in Dhanbad district.

Some of the Life Insurance Companies were doing excellent business while a few others were confined to very limited business. It may be noted that none of the Life Insurance Companies mentioned above had their managing directorship in Bihar.

These companies worked through a chain of agents. The agents were, however, more confined to the urban areas. The agents gave good service to their clients.

With the nationalisation of Life Insurance business, the Life Insurance Corporation of India became the largest single agency doing Life Insurance business in India. The Corporation was constituted under the Life Insurance Corporation Act of 1956 and was officially established on 1st September 1956 by the Government of India. From this date all Indian Life Insurance and Provident Fund Societies as also all foreign Life Insurance Companies ceased to carry on Life Insurance business in India, and all their business was taken over by the Life Insurance Corporation. As the security of the policy money was guaranteed by the Central Government the interests of the insured persons were safe.

General Insurance work which includes fire, marine, accident, theft, burglary, motor vehicles, etc., has been left open to the concerns in the private sector. Some of the former Life Insurance Companies and Societies have now switched over to General Insurance business. Some of the previous Life Insurance Companies have closed down.

Since 1st September 1956 the Corporation has a branch office in the district of Dhanbad with two development centres at Katras and Chirkunda and there is a sub-office at Sindri under Jamshedpur Division in the Eastern Zone. The Sindri sub-office was started in March, 1959 and the Katras and Chirkunda Development centres in 1961 and 1962 respectively. The Sindri sub-office has been functioning as a branch office directly under Jamshedpur Division. There is an Assistant Branch Manager (Development) at Sindri. The Katras and Chirkunda Development centres are under Dhanbad branch with an Assistant Branch Manager (Development). There are a number of Field Officers in the area who have an area in their charge and work through the appointed agents distributed over the villages. These village agents secure business through direct contact with the people. These agents about 1,000 in number are on commission basis.

Life Insurance business has been expanding as shown by the figures given below for the years 1956 to 1961. The figures below include the figures of Sindri sub-office as well:—

Year.	Proposals introduced.		Proposals completed.	
	Number.	Amount.	Number.	Amount.
		Rs.		Rs.
1957	Not available	1,84,000	Not available	1,67,000
1958	5,162	2,42,00,000	4,918	2,30,00,000
1959	5,019	2,75,28,000	5,352	2,48,15,750
1960	5,750	3,41,44,750	6,587	3,18,36,250
1961	7,112	3,14,09,350	6,609	1,29,83,500

General Insurance includes the insurance of godowns, money in transit, goods in transit, fidelity guarantee, personal accident, fire, etc. General Insurance work may be divided into three categories—(1) Miscellaneous accidents in which motor cars, trucks,

buses, taxis, motor cycles, burglary, etc., are included; (2) Fire including riot, risks, etc., usually covering properties, houses, godowns, workshops, factories, etc., and (3) Accidents due to which goods may not arrive intact whilst in transit from one centre to another. Motor cars and trucks are insured compulsorily against third party risks.

There are three subsidiaries of Life Insurance Corporation of India, viz., Oriental Fire, National Fire and Asiatic Government Security. The Oriental Fire, National Fire and Asiatic Government Security have merged into one company which is known as Oriental Fire and General Insurance. Companies like New India General, Hindustan General, Ruby United India Fire and General, South India Insurance Company, Commonwealth Insurance Company and New Great Insurance Company are also doing business on this line.

Dhanbad being an industrialized area offers a good field for General Insurance work. But there has not been any adequate work more because of conservatism among those who should take out such policies. Godowns as a class are not insured against burglary or fire. Consignments of big valuations are often sent without any insurance. So far as households are concerned very few house owners take out a policy for fire or destruction through other agencies. Household effects are seldom insured against theft or fire. Excepting the third party risk insurance for a motor car which is a statutory obligation there is not a regular practice to take out insurance policies for valuable possessions. The figures of General Insurance work in the recent years were not available.

STATE ASSISTANCE TO INDUSTRIAL DEVELOPMENT.

Under the Bihar State Aid to Industries Act, 1956, Government grants loans and other technical help to persons carrying on or intending to start industries. This aid is calculated to give encouragement to the growth of small-scale and cottage industries. A list of these industries supplied by Industries Department is given in the table below showing the kinds and number of industries started and the amount of aid given to them. No field check was done whether the money has been properly utilized or not.

Name of Industry.	Number of units aided and amount advanced.					
	1959-60.		1960-61.		1961-62.	
	Units.	Amount in rupees.	Units.	Amount in rupees.	Units.	Amount in rupees.
1	2	3	4	5	6	7
1. Engineering Works and Products.	5	22,675	5	28,040	7	21,300
2. Printing Press ..	Nil	Nil	Nil	Nil	4	15,060

1	2	3	4	5	6	7
3. Carpentry	2	4,325	5	18,100	10	16,282
4. Blacksmithy	3	950	4	7,150	3	800
5. Tailoring	6	6,278	7	7,682	11	3,072
6. Leather Products ..	3	3,608	9	12,000	8	5,175
7. Tile Making	Nil	Nil	1	5,000	Nil	Nil

COURSE OF TRADE.

Dhanbad district has Santhal Parganas to the north, the district of Burdwan in West Bengal to the east, the Purulia district in West Bengal to the south and the district of Hazaribagh to the west. The district is well served by railways and roadways. The district is easily connected with Calcutta, Jamshedpur, Patna, Kanpur and Delhi.

Regarding Trade H. Coupland in the last *District Gazetteer of Manbhum* (1911) mentions as follows:—

"Coal is of course the most important article of export, followed closely in point of value by lac, a long way behind these both in quantity and value come rice, paddy, gram and various pulses, in all of which, however, a comparison of the figures for the last two quinquennial periods (ending March 1905 and 1910 respectively) there is a tendency to decline, due largely no doubt to the rapidly increasing industrial population of the coalfield area, and the diminishing area available there for cultivation. The extent of the lac trade has already been referred to; its financial importance to the district may be inferred from the fact that, taking the lowest computation, the value of lac exported in 1909 was approximately 40 to 50 lakhs of rupees as compared with 150 lakhs for coal and 3 lakhs for all kinds of food-grains. The chief imports are food-grains, namely, rice and pulses, sugar, refined and unrefined, salt, English and Indian cotton piece-goods, and Indian cotton-twist, tobacco and kerosene oil. The bulk of the exports go to Calcutta, though coal in large quantities goes to Bombay, the United Provinces and other Provinces, and a considerable quantity of raw lac to Mirzapur. Bihar and Burdwan take the bulk of the exports of rice, and Ranchi and Singhbhum the various pulses. Of the imports the bulk of the rice comes from Burdwan, Bankura, Singhbhum and Sambalpur, and of gram and pulses from

the Bihar districts and Ranchi. Burdwan and Bihar share in providing most of the raw sugar and tobacco; oilseeds come principally from districts of Bihar and other districts of Chota Nagpur; raw lac in considerable quantity comes from Ranchi and Singhbhum and the bulk of the remainder of the imports comes direct from Calcutta. The chief centres of trade are the towns of Purulia and Jhalda, Dhanbad, Jharia, Katras and Chirkunda in the north of the district, Balarampur and Chandil in the south, all on the line of railway, and Manbazar and Barabazar in the east and south-east.

"The Dhanbad subdivision is particularly well served by railways, the Purulia subdivision not so well, but the Asansol-Sini line intersects it from north-east to south-west almost centrally, and the western half is again intersected since 1908 by the Purulia-Ranchi line; the Kharagpur-Gomoh branch cuts across the north-eastern corner and connects up the rest of the area with both Calcutta and the coalfield. Communications by road are on the whole good; passable fair-weather roads connect all parts of the district with one or more railway stations, and the main routes are metalled with either stone or gravel. The one existing drawback which hampers trade at all times and periodically stops through communication in the rains is the large number of unbridged rivers and streams. Outside the places mentioned there are comparatively few permanent markets, and the bulk of the ordinary trade of the district is carried on by means of the weekly *hats*, many of which are held at places more or less intermediate between the distributing centres and the rural areas which they serve. In the wilder parts of the district pack-bullocks are regularly used as the only suitable means of conveyance, and the travelling purveyor of Manchester cloth and other village requirements or luxuries is no uncommon sight. For the purchase of the products of the rural areas agents are sent out from the chief centres to the *hats* and villages and much of the produce, more particularly such articles as grain, oilseeds, hides, etc., for export, are thus bought locally; lac and other forest produce is usually brought into the larger *hats* and to the places of manufacture. Inter-district traffic by road with the southern and western portions of Ranchi is considerable, Chandil being the main distributing and collecting centre, and a great part of the produce of the south-eastern corner of the district finds its way to

various stations on the Bengal-Nagpur Railway in the Singhbhum district. In the west Jhalda, which is now connected by a good road with Gola, does a large amount of trade with the south-eastern portion of Hazaribagh; in the extreme north there is a considerable inter-district traffic between Tundi and the Santhal Parganas, gram and straw from which as well as timber from Palganj in Hazaribagh find their way in large quantities to the coalfield by road."*

It was also mentioned: "The collieries are served by a network of loops, branches, and sidings taking off from the main lines of both the Bengal-Nagpur and East Indian systems, and the inter-connection of the two systems at Gomoh, Katrasgarh and Jharia makes it possible for the colliery proprietor to despatch his coal to any part of India by the most convenient route."†

The development of means of communication since H. Coupland's time has had a great impact on trade and commerce of the district. There are now hundreds of passenger buses and carrier trucks running within the district and connecting the district with other parts of the State and the other neighbouring States. The traditional bullock-carts have not been eliminated but the number has considerably increased. Primary trade in the rural areas that are the source of agricultural produce is still in the hands of *Vyaparis* and village *Banias*. *Vyaparis* buy the grains and other commodities from the growers at their villages or at a *hatia* which is a more central place where the commodities are brought by the villagers either on carts or as head-load. The *hats* still continue to be the primary source for the turnover of certain types of commodities. The primary cultivator has no means to hold back the grains nor are there handy storage facilities. Public carrier trucks or privately owned trucks call at such of the *hats* which are situated on motorable roads and *Vyaparis* coming in these trucks buy up the vegetables, *ghee*, grains, sheep, goats, etc.

In Dhanbad the business community comprises of Agarwals, Cutchhis, Bhatias, Agraharis, Marwaris, Muslims and the *Banias*.

TRADING POPULATION.

As regards the number of persons employed in commerce, the census report of 1951 mentions that in Dhanbad district, out of a population of 7,31,700 about 17,150 people are engaged in commerce. The bulk of them, i.e., 10,049 are living in urban areas as against 7,101 in rural areas.

* Extract from the old *Gazetteer of Manbhum*, pp. 167-168.

† Extract from the old *Gazetteer of Manbhum*, P. 185.

The table below shows the number of persons engaged in different kinds of commerce:*

Name of business.	Number of persons.		
	Males.	Females.	Total.
1. Retail trade in food-stuffs ..	6,753	1,447	8,200
2. Retail trade in fuel (including petrol).	402	15	417
3. Retail trade otherwise unclassified	6,403	853	7,256
4. Retail trade in textile and leather goods	782	107	889
5. Wholesale trade in food-stuffs ..	154	..	154
6. Wholesale trade in commodities other than food-stuffs.	2	..	2
7. Money-lending, banking and other financial business.	186	2	188
Grand Total ..	14,682	2,424	17,106

IMPORT AND EXPORT.

The commodities entering in the internal trade include food-grains, salt, spices, cotton, woollen cloth, kerosine oil, *vanaspali* oil, petrol, vegetables, cosmetics and other luxury goods, cycles, radios, crockeries, suitcases and mustard oil, etc. The commodities that enter into the external trade include coal, cement, firebricks, fire-clay, hides, iron and steel, fertilisers and coaltar.

The statement below indicates some of the main centres and areas of import and export:—

IMPORT.

Commodities.	From where imported.
1. Cotton piece goods ..	Kanpur, Ahmedabad, Bombay, Calcutta, Bhagalpur, Indore and Wadibunder.
2. Salt ..	Calcutta, Dumri and Tuticorin.
3. Iron and steel ..	Tatanagar, Kulti and Calcutta.
4. Grains and pulses ..	Kanpur, Agra Cantt., Hapur and a number of places in Uttar Pradesh, Assam and Madhya Pradesh.
5. Wheat ..	Punjab and Shahabad district in Bihar.

* Extract from *District Census Handbook, Dhanbad, 1954*, pages 37 to 40.

Commodities.	From where imported.
6. Kerosene oil	.. Budge Budge.
7. Petrol ..	.. Ditto.
8. Lime ..	.. Jabbalpur.
9. Vegetables ..	.. Ranchi, Jamshedpur, Gaya, Patna (all in Bihar).
10. Mustard oil ..	.. Patna and Gaya (all in Bihar).
11. Shoes ..	.. Kanpur, Agra, Delhi and Calcutta.
12. Fish ..	.. Calcutta.
13. Sugar ..	.. Dalmianagar and Bihta (Bihar).
14. Tobacco ..	.. Gaya and Darbhanga (Bihar).
15. Chillies ..	.. Patna.

EXPORT.

Places.	Commodities.	Destination of export.
1. Dhanbad ..	Coal, hides, marble and stone, oil, fuel, other mineral oils and gun-nies.	Calcutta, Patna, Delhi and Uttar Pradesh.
2. Kumardhubi ..	Iron and steel, fireclay and firebricks.	All over Bihar, Calcutta, Assam, Delhi and Uttar Pradesh.
3. Katras ..	Coal and hides and skins.	All over Bihar, Calcutta and Delhi.
4. Jharia ..	Firebricks, coal and marble and stone.	All over Bihar, Calcutta and Delhi.
5. Patherdih ..	Coal and hides and skins	Calcutta, Uttar Pradesh and all over Bihar.
6. Lodna ..	Coaltar	All over Bihar, Calcutta, Madhya Pradesh, Delhi and Uttar Pradesh.
7. Sindri ..	Cement and sulphate of ammonia.	All over Bihar, Calcutta, Delhi, Uttar Pradesh and Madhya Pradesh.

The movement of the commodities in the above statement is done mostly by railways. Recently, however, fast moving trucks had been playing an important role in moving goods both to and from the district. With the construction of the National Highway from

West Bengal and the development of a number of roads under the Five-Year Plans, the number of trucks operating through Dhanbad will be on the increase. Trucks are mainly employed for keeping up trade contacts with Dhanbad and Ranchi, Patna, Hazaribagh, Calcutta and Santhal Parganas. Trucks are also largely used for sending stuff to Delhi. Trucks are now (1962) very largely used for movement of coal to Assam, Bengal and Uttar Pradesh because of wagon difficulties.

Certain commodities like petroleum, kerosene oil, cloth, grains, spices, etc., are both imported and exported. This means that the big merchants of the district act as the agent and they import the goods and also despatch them to various other places to their retailers.

The following statistics of the volume of goods traffic at Dhanbad, Kumardhubi, Katras, Jharia, Patherdih, Lodna and Sindri Railway Stations in 1961-62 have been collected from the Railway authorities:—

Commodities.	Exports in tons.	Commodities.
<i>Sindri.</i>		
1. Sulphate and ammonia.	20,819,523	Commoditywise figures of imports were not available at Sindri Station.
2. A. C. C. cement	895,752	The Railway authorities could only mention that there was a total quantity of 27,469 tons of article imported to Sindri Station.
<i>Lodna.</i>		
1. Coaltar ..	1,830,420	Commoditywise figures of imports were not available at Lodna Station. It was gathered that a total quantity of 67,803 tons of articles was imported to Lodna Station.
<i>Kumardhubi.</i>		
1. Iron and Steel	2,086,422	Commoditywise figures of imports were not available at Kumardhubi Station. It was gathered that a total quantity of 126,529 tons of articles was imported to Kumardhubi Station.

Commodities.	Exports in tons.	Commodities.
<i>Jharia</i>		
1. Coal	} 30,325	Commoditywise figures of imports were not available at Jharia Railway Station. It was gathered that a total quantity of 96,435 tons of articles was imported to this Station.
2. Firebricks		

Katras Railway Station.

1. Coal	} 10,434	Commoditywise figures of imports were not available at Katras Railway Station. It was gathered that a total quantity of 19,526 tons of articles was imported at the Station.
2. Hides and skins and grains.		

Dhanbad Railway Station.

1. Coal	2,434	} Commoditywise figures of imports were not available at Dhanbad Railway Station. It was gathered that a total quantity of 47,423 tons of articles was imported at the Station.
2. Other grains	545	
3. Hides, Skins and Leather.	134	
4. Marble and Stone	307	
5. Oil fuel	28	
6. Other Mineral oils	96	
7. Gunnies	143	

The receipts of Sales Tax also indicate the volume and value of internal trade. The rate of Sales Tax varies from 2 nP. to 9 nP. under Bihar Sales Tax Act, 1959 which has repealed the Old Bihar Sales Tax Act, 1947. There are two types of taxes, i.e., General Sales Tax and Special Sales Tax.

General Sales Tax is levied at the rate of $\frac{1}{2}$ per cent of the total taxable turnover. Special Sales Tax is levied at different rates as specified in Schedules I, II and III appended with Government circular nos. 9133 and 9134, dated the 1st July, 1959.

List of goods exempted from the levy of General Sales Tax only are coal, hides and skin, iron and steel, oilseeds, fertilisers, fruits and bullion, etc. The rate of Special Sales Tax is 2 nP. in the above commodities per rupee of the turnover. Sales Tax is not levied on all commodities, but there are a few items which are exempted from it, for instance, *khadi* cloth, cotton, sugarcane food, meat and fish,

common salt, fresh milk, livestock and green vegetables, etc. Another difficulty in the way is that special Sales Tax is levied on only such businessmen whose annual turnover exceeds Rs. 15,000 and hence it cannot be a true pointer as many dealers have a very small turnover to come within the purview of Sales Tax. From 1st July, 1959 there has been a change in the law regarding the collection of Sales Tax. Sales Tax is also levied on such businessmen whose annual turnover ranges from 5,000 to 15,000. They are known as enrolled dealers and given enrolment certificates. This system has been helpful to some extent to raise the value of internal trade. Another difficulty in the way is this that tax on the gold and bullion was not levied on their actual turnover up to 30th June 1959, but the amount to be collected from each district was fixed at the State level. Sales Tax does not give us separate amount collected on the turnover of different commodities in trade. It is also not possible to assess the number of tax-evaders and the amount of tax evaded. The figures of Sales Tax could be used to indicate at least the value of internal trade in the district.

CENTRES OF WHOLESALE BUSINESS.

There are mainly nine commodities, namely, coal, cement fertilisers, fireclay, firebricks, coaltar, cloth, grain and turmeric arranged according to importance in which wholesale business is carried in the district. Many retail dealers of other districts like Ranchi, Gaya, Hazaribagh, Patna, Bhagalpur and Santhal Parganas have a direct contact with the wholesale dealers of this district. The petty and less resourceful dealers of the district have their dealings with the local wholesale merchants.

Dhanbad being predominantly an industrial district and its main industry is coal. The most important item of trade of the district is coal which is not only sent to different parts of other districts of the State by road or rail, but also exported to different parts of our country. Coal has been covered in detail elsewhere.

The chief centres of wholesale business in the district are Jharia, Dhanbad, Kerkand, Katras, Sindri, Chirkunda, Gobindpur and Patherdih. Dhanbad, Jharia, Katras and Chirkunda are the chief marketing centres in the district.

Wholesale trading in food-grains is also carried out at each of the wholesale trading centres of the district but the most important of them are Chirkunda, Dhanbad, Jharia and Katras. Chirkunda is one of the important wholesale business centres of the district. Though wholesale trading in food-grains is carried out, there is not a single grain *mandi* in the district. The wholesalers take cloth and food-grains from outside the district and the retailers of *muffasil* area take cloth and food-grains from these wholesalers of Dhanbad district. The State Government also provide credit facility to some extent to the retailers who run Government Fair Price Shops.

RETAIL MARKETING CENTRES.

The main retail marketing centres in the district are at Dhanbad, Katras, Jharia, Kumardhubi, Chirkunda, Sindri, Patherdih, Gobindpur, Nirsa and Tundi. At all these places retail shops for almost all the commodities locally consumed are found. Particular items like radio receiving sets, sewing machines, cycles, etc., are also to be found in almost all retail marketing centres.

It is understood that there are about 175 registered wholesale dealers and about 2,365 registered retail dealers in this district (1961). Retail trading is done in all kinds of commodities like food-grains, cloth, silk, sugar and *kirana* goods, etc. It is difficult to determine the actual volume of retail trade due to inadequacy of statistics, tax-evasion and clandestine business. It would, however, be fair to assume that the amount of Sales Tax and other commercial taxes collected give some indication. The receipts of Sales Tax have been discussed elsewhere.

Retail shops, which provide a link between the consumer and the wholesaler, are located in various yards of Dhanbad and other towns and to a certain extent cater to the needs of the inhabitants of the localities. The stock-in-trade of the majority of retail trade shops is limited but rapid replenishments are made. The capital investments of most of the shops are also limited. Retailers usually have dealings with some wholesalers in the town itself but not infrequently they have dealings with bigger traders outside. Retail sales are generally on cash basis but goods on credit are also given to some consumers whose accounts are settled periodically. It is feared that for a large percentage of sales no cash memos are given and payment of Sales Tax is avoided.

Among retail trade shops in the district the grocery group is most important. It has the largest number of shops and provides the largest employment. Cereals and pulses, spices, jaggery, oil, *ghee*, condiments, tea, coffee, indigenous drugs, dry fruits, tinned food-stuff, cigarettes and a number of other miscellaneous goods are sold in these shops. The value of stock-in-trade of individual shops varies widely, i.e., from Rs. 1,000 to Rs. 10,000 and above. The retail shop-keepers, in this group, get their stock from wholesale dealers either local or outsiders. The wholesale dealers get their stock from Calcutta, Bombay, Kanpur, etc.

Next in importance to groceries come the sweetmeat and other shops that sell cooked food. There are a large number of them in Dhanbad and Jharia towns. There is a brisk daily trade in this form of business. The stock-in-trade of this type of shops varies from Rs. 300 to Rs. 1,000 and above.

Pan, *bidi* and cigarette shops are plenty. They have a large turnover in the district. Sale is mostly on cash basis. Most of the establishments are man establishment. The stock-in-trade is

generally obtained locally and sometimes from outside. A large number of these establishments make small quantities of *bidis* sufficient for their own sales. The value of stock-in-trade varies from Rs. 25 to Rs. 500 or above.

As regards cloth and hosiery it may be mentioned that these shop-keepers sell all kinds of textiles, cotton, woollen, silk for shirting, coating, etc., *sarees*, *dhoties*, towels and various kinds of hosiery. Ready made garments have a very good sale in this district. The stock-in-trade of an average shop is usually Rs. 500 but a few large shop-keepers stock goods worth many thousands. Handloom and powerloom products manufactured in the district and outside are obtained either directly from factories or from wholesale dealers. Sales usually shoot up during festivals and marriage season.

Footwear and other leather goods, accessories of shoe making such as sewing thread, nails, clips, belts, purses, etc., are sold by shop-keepers, big and small. The value of stock-in-trade of these traders varies from Rs. 1,000 to Rs. 10,000 and above. Business is generally slack during monsoon and brisk during the summer season.

Shop-keepers under the group of Chemists and Druggists sell chemicals of various kinds, foreign and indigenous drugs, medicines and surgical instruments. A large part of the chemical drugs and medicines stocked is of a foreign origin and brought mainly from Bombay and Calcutta. There has been a large expansion of business in medicines and surgical goods. The sales representatives of the medical concerns are usually very smart and pushing and form a superior group to their colleagues in other lines. They are also better paid and better equipped.

Hawkers.

Hawkers play a comparatively less important role in the retail trade in the urban areas of this district. They play a more important role in semi-urban areas. They sell comparatively cheaper articles usually in everyday use, viz., fruits, nuts, sweatmeats, sugarcane juice, cheap utensils, toys, etc. Hawkers who sell tea, sweetmeats etc., are given licenses and a license fee of Rs. 2 each per month is collected from them. There are, however, a large number of hawkers who do not take licenses from the Municipalities. Hawkers are usually found near the railway stations, bus stands and cinemas.

FAIRS, MELAS AND OTHER RURAL MARKETS.

Fairs and *melas* in the district may be divided into two categories, viz., seasonal and permanent. Seasonal fairs are held in a particular season determined by the lunar calendar. Permanent fairs or *hats* are held throughout the year on fixed days in the

week and are locally known as *hats*. Seasonal fairs are basically religious in origin while *hats* on fixed days are more commercial in its origin.

Seasonal fairs are held at Katras, Maharajganj, Dhaiya, Madhuban, Tisra, Baghmara, Topchanchi, Saharpura and Dhanbad town. By far the most important among the seasonal fairs are at Dhanbad town, Jharia town and Katras.

At Dhanbad town fairs are held on many occasions in the year, viz., *Phalgun Triodasi*, *Basant Panchami*, *Sravan Nag Panchami*, *Shivaratri*, *Anant Chaturdasi*, etc. The congregation on the occasion of *Sravan* is the largest and next comes the one at *Basant Panchmi* festival.

Fairs are also held in Dhanbad on the occasion of *Durga Puja* and *Dewali*. The *Durga Puja* lasts for about ten days and attracts a large number of visitors both rural and urban. A big *mela* is held on the occasion of *Muharram* at Dhanbad town.

Every *mela* is a great clearing house. A large number of temporary shops crop up and articles of almost every description are sold and purchased. The visitors and particularly those from the rural areas visit the *melas* also for making purchases for their domestic needs like furniture, utensils, etc.

The number of *hats* is quite considerable in the district. A *hat* is held once or twice a week and as mentioned is the primary market for grains and other commodities.

Apart from *hats* and fairs there are several permanent *bazars* in the district usually on the main roads. Generally at these shops commodities, like cloth, salt, mustard oil, kerosene oil, *ghee*, condiments, pulses, cereals, etc., are sold. Originally at every 10 or 15 miles of the Grand Trunk Road there were *chattis* or halting places where a few small shops were held. Now all these places like Bagodar, Dumri, etc., have a good *bazar*. The sweetmeat shops at these way-side places have a large sale because of the heavy motor traffic. Usually these places have got more than one petrol shop.

The following are the list of *hats* and *melas* of this district:—

Hats.—Palmatree, Laloodih, Pindrajore, Mangra, Latipahari, Mohuda, Baghmara, Nirsa, Kumardhubi, Nawatwar, Maniadih, Tundi, Keshka, Bijra, Gobinpur, Chirkunda and Jharia.

Melas.—Khalai Chandi, Puchora, Sarauni, Ulgora, Chargosia, Nirsa, Gopalganj, Salukchapra, Kairy, Pindra *hat*, Pathar Kuan, Dumar Kunda, Beheiya, Dekjora, Pating, Behichipur, Bhogatu, Tassa, Bhimphor, Dhaiya, Pardhan Khanta, Balliapur, Paharpur, Kolahar, Laudhadih, Maharajganj, Bijra and Salukehapur.

CO-OPERATION IN WHOLESALE AND RETAIL TRADE.

There is mutual co-operation between the wholesale and retail dealers as their business is inter-dependent. The wholesale dealers supply the goods to the retailers on credit. The retailers repay the amount to the wholesaler after selling the goods. But this credit facility is given only to reliable and trusted retailers. Credit facility is usually not given in gold and silver business. Perishable goods are also not normally given such facilities although lump sums are allowed by the wholesalers as loans.

MODE OF DISSEMINATION OF TRADE NEWS.

Trade news of markets in general percolate to the local merchants through letters, daily papers, radios, telephones and telegrams. The daily newspapers published from Patna, Calcutta or other places in English or in the vernacular languages carry trade news and they are eagerly scanned. Recently some exclusive trade journals in English are becoming popular with the English knowing businessmen. Besides, the merchants also receive information from Government Department. A marketing section has been recently opened under the Agriculture Department and a price reporter has been appointed who is expected to communicate news regarding trade and commerce to the traders and also the fluctuations of daily rates of market. The tradesmen of Dhanbad as a class have very little use of this section. The information catered by this agency is usually stale as the tradesmen assert.

PRICE CONTROL MEASURES.

Due to exigencies of the Second Great War there was an abnormal rise of price of certain essential commodities, viz., rice, wheat, cloth, cement, kerosene, petrol, etc. It became necessary to control the supply and consumption of these essential commodities. A co-ordinated policy of the State and Central Governments was evolved and a machinery was introduced to work the scheme.

Fair Price Shops were opened in the urban areas. A buffer reserve of essential commodities was sought to be built up by the State Government by direct procurement of food-grains and other articles, stock them in Government godowns and regiment supply and consumption through the Fair Price Shops which were licensed. The system of ration cards for the consumer was insisted on where a maximum quota of food-grains and cloth was laid down for each individual in a family unit.

The Fair Price Shops were first started in Dhanbad in 1942 for supply of rice, wheat, sugar, kerosene oil and cloth, etc. At no stage was there a totalitarian control. This arrangement continued throughout the war period and is still continuing in some shape or other and is particularly helpful whenever there is a strain on the supply.

During War period Government had also to exercise control over cloth, steel, iron goods, cement and petrol but the supply of these commodities was not made through the Fair Price Shops. These commodities continued to be supplied to the public through their normal agencies but under the restrictions imposed by statutory orders.

The control on the cloth and some of the essential food-grains was quite rigid up to 1946. The rigid control was withdrawn in the later part of the year 1946 but had to be re-imposed in December, 1949. Although the control on the distribution of some articles was withdrawn, the system of license on basic essentials such as wheat, rice and cloth had to continue.

The scheme of Fair Price Shops had to be extended from Dhanbad town to other urban areas such as Sindri and Jharia. It was found unnecessary to extend them to the rural areas as the villages were never starved of the supply of such food-stuff although there was a rise in the prices.

To store the food-grains a number of godowns were started in Dhanbad and the godowns in Dhanbad town acted as the Central Supply Unit.

There are now Government godowns at Dhanbad, Jharia, Chirkunda, Katras and Govindpur to distribute grains to Fair Price Shops. The following statement supplied by the District Supply Officer shows supply of food-grains (wheat and rice, etc.) through Fair Price Shops, number of godowns for storage of Government food-grains and number of Fair Price Shops functioning in the district of Dhanbad from 1957-58 to 1961-62:—

—	1957-58.	1958-59.	1959-60.	1960-61.	1961-62.
1. No. of godowns functioning.	11	11	5	5	5
2. Supply of food-grains (in maunds).	6,46,027	7,13,322	6,48,682	6,10,625	Not available.
3. No. of Fair Price Shops.	Not available.	Not available.	208	208	208

The industrial labourers working in collieries do not get sufficient time to purchase wheat from Fair Price Shops. A Flour Mill was established on 1st October 1961 at Dhaitya in Dhanbad town to cope with the demand of flour mostly to industrial labourers. The State Government grants permit to this mill and now the mill gets a supply of 100 tons of wheat daily from the Government of India.

The State Government has issued permits to eight *atta chakkis* all located at Jharia to make *atta* from wheat. The Central Government supplies wheat to these *atta chakkis*.

There is a Central Food Storage Unit at Bhaga maintained by Government of India. It is the feeding centre of all the godowns in the district.

The aftermath of the Second Great War could not normally subside owing to unfortunate droughts and scarcity conditions that had visited the district from time to time. The Supply Department at the Secretariat level and the District Supply Officer under the Deputy Commissioner at district level had to continue.

During the later part of 1958 there was scarcity of rice and price soared high. Government introduced the Bihar Milled Rice Procurement (Levy) Order, 1958 according to which mill owners and dealers were required to deliver 25 to 50 per cent of their production to Government at the rate of Rs. 16 per maund for standard medium rice. There was scarcity in certain particular pockets. Since 1960 the position of the supply of rice and wheat has considerably eased up. Fair Price Shops sell more of wheat as the ruling price of wheat in the open market is higher.

CONTROL ON OTHER ARTICLES.

Sugar.—Control on sugar was imposed in 1944 in Dhanbad but it was withdrawn in 1948 because the supply position of sugar had considerably improved. There was again scarcity of sugar in 1950 and sugar was controlled under Sugar Control Order. In 1953 the control over sugar was suspended and there had been no control till April, 1959. The Bihar Sugar Dealers Licensing Order was introduced in 1959. In 1961, 65 sugar dealers' licenses were renewed.

The licensed dealers get allotment of sugar on their indents direct from the Chief Director of Sugar and *Vanaspati*, New Delhi on the recommendations of the Deputy Commissioner through the State Government. Initially in 1959 this district used to be allotted 11 wagons of sugar each consisting of about 605 maunds. In 1960 the quota was raised to about 16 wagons and in the later part of 1960 the quota was further raised to about 32 wagons which continued till about July, 1961. The system of allotment of sugar to the wholesale dealers was abolished since July, 1961.

Iron and Steel.—At present (October, 1962) iron and steel are in short supply although there is no direct control. There are two registered iron stockists in the district. Allotment of iron is made by the State Government to the stockists through quota certificate. The stockists submit indent to the Iron and Steel Controller, Calcutta. The supply is irregular and inadequate.

Cement.—The Bihar Cement Control Order, 1948 was introduced in December, 1948, which required dealers to obtain license and dispose of the stock at controlled rates to permit holders. In 1958, due to satisfactory position of cement, control over the distribution was relaxed. In 1959 the control over distribution of cement was withdrawn. In 1960 due to want of wagon supply, position of cement became uncertain and Government have had to introduce the quota system on cement allotment. The selling rate of cement has to be fixed by the Subdivisional Officers concerned. There are about 59 cement licensees in the district and the present quarterly quota of the district is about 120 wagons but there is difficulty in wagon movement.

Coal.—There is no problem of coal or its distribution within the district because this district is industrial and coal is the chief industry. There are about 50 coal dealers' licensees who get coal from local collieries to sell coal for local consumption. The present rate of coal in the market is Re. 1.25 per maund (October, 1962) in Dhanbad.

Kerosene Oil.—The Bihar Kerosene Oil Control Order was promulgated in October, 1948 in Dhanbad to regulate the supply and distribution of kerosene oil. In 1950 there were 9 wholesale agents and 921 retailers in this district. Till 1951 the supply of kerosene oil was scarce and there was full control on it. In 1952 due to foreign supply, i.e., from Burma and other places the position somewhat improved and in 1953 the control on kerosene oil was withdrawn.

Cloth and Yarn.—The Government of Bihar had promulgated the Bihar Cloth and Yarn Control Order in November, 1948 in Dhanbad. This required the wholesale dealers, retailers and hawkers to take licence and sell the commodities at controlled rates. Cloth and yarn had to be imported through provincial nominees. Prior to 1948 standard cloth as an austerity measure was sold in 1947 (*dhoti saree* and *markin*) of red and black border through Government machinery. Woollen standard cloth for coating and shirting was also sold through licensed shops. In 1946 cloth was sold on ration cards to the public. This system lasted for three years and was closed down in 1947.

In 1953 the system of obtaining cloth and yarn through provincial nominee was discontinued, since then the cloth and yarn merchants were simply required to take licence for dealing in cloth and yarn and work on their own. In 1962 there are 29 wholesale dealers and 672 retail dealers in cloth.

The Agro-Economic Research Centre of Visva-Bharati University had studied the working of the Fair Price Shops in Bihar, 1956-57 and their brochure on the subject is their *Ad Hoc Studies* : no. 2.

From this report it would appear that there was no marked rise in the prices of food-grains in Bihar till the end of 1955. But by February, 1956 prices were beginning to show an upward turn. This made the Bihar Government decide in favour of opening Fair Price Shops in the city of Patna. In February, 1956 food-grains prices all over the State had risen considerably and the prospect did not seem bright at all. *Rabi* crops were damaged in 1956-57 and prices started soaring from the beginning of 1957. Fair Price Shops had to be opened in other districts as well. The study was spread over Patna, Ranchi and Bhagalpur.

This research team comes to the conclusion that there was a confusion in Government circles regarding the objectives of the Fair Price Shops. The main purpose behind the opening of Fair Price Shops in the earlier stages was to influence market prices through their operation. Later on since middle of 1957 this approach was allowed to recede to the background and the objective of giving relief to the consumers was adopted by the Food Department in the State.

There was also a certain amount of confusion and a duality in the field of responsibility for the administration of these Fair Price Shops between the Central and the State Governments. Whenever supplies were not available, the State Government blamed the Central Government, and when the administration of these shops were not efficient the blame was shifted by the Central Government to the State Government, which was actually responsible for the supervision of these shops. The main responsibility recognised by the State Government was that supplies made available to the Fair Price Shops were sold at fixed rates. The rates were Rs. 14-8-0 for wheat and Rs. 16-8-0 for rice at retail price per maund respectively. There was little control over the ruling prices elsewhere.

There was a lot of complaint of the shop owners as well as the public against the irregularity in the supply of food-grains to these shops. The shop owners complained that the procedure for obtaining stocks was dilatory and complicated. There used to be gaps of 2 to 3 days between the exhaustion of old supplies and the receipt of new stocks and during these days the customers had to be refused.

After a certain amount of well-based research, the team came to the conclusion that the main objective of the Fair Price Shops to bring down the market price of foodgrains was not achieved. The quantity available at the Fair Price Shops was not always sufficient and so even the Fair Price Shop customers had to go to the open market and buy rice and wheat at a much higher price. Over the same period the difference between market price and the fair price had increased from Re. 0.50 to Rs. 6.50 per maund of wheat. The data convinced the team that the Fair Price Shops in Bihar did not succeed in bringing down retail prices in the market.

The consumers' reaction to the Fair Price Shops was not very favourable. A common complaint was that due to the irregularity of the supply of food-grains the consumers had to make several trips during the week before they could obtain supplies. There was also a general complaint against the quality of wheat supplied through the Fair Price Shops. It was also complained that rice was not always available in the Fair Price Shops.

The survey also revealed that consumers' preferences cannot quickly be changed by forced distribution through recognised shops. In spite of rising prices people would still stick to buy rice and would not take cheaper wheat. Among people in the different income groups, those with income below Rs. 200 per month benefited most from the Fair Price Shops.

The general observations and conclusions of the research team based on their study in Patna, Bhagalpur and Ranchi could, however, apply to the other districts as well to a very great extent.

MERCHANT AND CONSUMERS' ASSOCIATION.

These associations are formed to foster the common interests of the businessmen and also to look to the interests of the consumers.

Some of the Trade Associations are listed below:—

- (1) Indian Colliery Owners' Association.
- (2) Indian Mining Association.
- (3) Indian Mining Federation.
- (4) Cloth Merchants' Association.
- (5) Cement Merchants' Association.
- (6) Food-grains Merchants' Association.
- (7) Retail Cloth Dealers' Association.

The details regarding Indian Colliery Owners' Association, Indian Mining Association and Indian Mining Federation which are registered associations have been given in the Chapter "Industries" of Dhanbad.

The other associations are unregistered and do not appear to play a very important part as their membership does not cover the bulk of the traders in their lines.

Since the Price Control measures were enforced the importance of the Trade Association has increased. A large number of Acts have been passed and regulations framed and it is not possible for a petty businessman to know their implications. The Associations form the link to help them in the interpretation of the law and also to guide them if they commit any breach.

There is no recognised or well-knit Consumers' Association in the district.

WEIGHTS AND MEASURES.

Regarding Weights and Measures H. Coupland in the last *District Gazetteer of Manbhum* (1911) mentions as follows:—

"The extension of the coal industry and the opening out of the district generally, which has resulted from it, has naturally led to the standardization of weights in the district. In the larger markets and generally at most places within reach of the railway the only weight in use is the standard seer of 80 tolas. In the more out-of-the-way parts, a seer varies from as little as 60 to as much as 112 tola, in Manbazar, south-eastern Barabhum, Baghmundi and elsewhere. Actual transactions, when dealing retail, are usually by measures bowls supposed to hold $\frac{1}{4}$ seer (*powa*) or a seer (*paila*) being used to measure grain.

"The standard cubic for all ordinary purposes is one of 18 inches; small units are the *anguli* or thumb-breadth, the *mushtis* of 4 *angulis*-three inches, and the *bigha* equal to three *mushtis*. Five *haths* in length by four *haths* in breadth make a chittak of 45 square feet land measure, 16 chittacks equal 1 katha, and 20 kathas one bigha."*

In Dhanbad district weights and measures of great diversities were in use. The Bihar Weights Act, 1947 did not come into force in any part of the district.

Due to creation of confusion and uncertainty in trade on the part of retailers, the State Government of Bihar enforced Bihar Weights and Measures Enforcement Act of 1959 in the whole State of Bihar. This Act was enforced in January, 1961 in Dhanbad and Sindri towns only. Hence with the introduction of the new Act of weights and measures in Municipal and Notified Area Committees it was considered desirable to replace the old weights by new metric weights. The metric system was enforced in urban areas, namely, Dhanbad and Sindri where the weights according to this system have been made obligatory.

Since 15th November, 1962, the State Government of Bihar enforced Bihar Weights and Measures Enforcement Act, 1959 for both rural and urban areas and with the introduction of metric system of weights and measures the age old systems of maunds, seers

* Extract from *Old Gazetteer of Manbhum* (pp. 108-109).

and *chhatak* and inch, foot and yard have now come to an end but not completely. This Act of 1959 has been compulsorily enforced in urban areas but some big wholesale dealers still use old weights in the markets.

Occasional prosecutions are launched for breaches of the Act. It may, however, be mentioned that the weighing machines of the railway authorities are not verified. The railway authorities claim that as they work under the Central Administration they do not come within the purview of State Government Act.

Standard weights are manufactured by *bona fide* licensed dealers. They sell standard weights. There are five dealers at Dhanbad and two at Sindri that sell standard weights.

CHAPTER VII.

COMMUNICATIONS.

Regarding early communications there are scraps of information in the monumental books of Col. R. H. Phillimore *Historical Records Survey of India*, Vols. I to IV. The early pioneers of survey faced great difficulties as there were hardly any regular roads. In the very early years merchants trading in India were but little interested in the interior of the country. Their factories were situated either on the sea coast or, as in Bengal, up the estuaries of the great rivers. Col. Phillimore also confirms from a study that for many years after the acquisition of Lower Bengal the waterways provided the most important lines of communication, especially for the purposes of internal commerce, and the Ganga river was the great highway. During the dry season, however, boats could not get through the shallows.

From Col. Phillimore's *Historical Records Survey of India*, Vol. III, it appears that in August, 1817 a committee was appointed to investigate the possibility of establishing an experimental telegraph communication between Fort William and Nagpore. The committee obtained the appointment of George Everest, the Superintendent of Great Trigonometrical Survey, for survey work in India. The party reached Chunar in May, 1818 and started working. Col. Phillimore has given an account of the difficulties encountered on pages 270 to 272 and 418 to 419 of the third volume of his book. The physical contour of the area interspersed with jungles and the height was considered at that time formidable difficulties for erecting telegraph poles. He mentions, "The distances between the telegraphs have generally been measured by taking the contained angle between one telegraph and any conspicuous object. Thus the mountain of Parasnaut, which presents several remarkable peaks, was used to determine the distances."

He also mentions, "Arrangements for postal service by means of *dak*-runners, *tappal*, *harkaras* and camel *harkaras* were made. Communication between Government offices at the towns was maintained by postal packets 'under flying seal', which were despatched in special bags, and were much more speedy than the public mail. Special Government sanction had to be obtained for the franking of letters whose official nature was at all in doubt, that they might be so included and allowed to pass free of charge."

The names of some of the early pioneers for survey work in this area could be mentioned. It has to be remembered that it is the surveyors who opened up the first communications in this tract. Mr. Rossenrode and Mr. Peyton were engaged in 1823 in exploring the tracts bordering on the road between Bancoorah and Burdwan for the southern stations and north of the Damodar river for the

northern stations. At the end of 1829 Gilmore and Ommanney, both of the Engineers, were deputed to survey the line for a road from Burdwan to Bihar, which was afterwards to be constructed as part of the Grand Trunk Road. There was a direct road from Burdwan to Bihar. Gilmore reported about the completion of the survey in a letter from Patna, dated the 22nd March, 1829. His road ran through Raniganj, Rupnarainpur, Palamau, Karakdiha and then to Bihar, about 36 miles south-east of Patna.

By 1830 the Department of Public Works staffed by the military officers, mostly of the corps of the Engineers had started survey and construction of roads. Everest and his colleagues had not seen a metalled road or a railway tract in India. The earliest officers of the Department of Public Works used to travel by *dak*, for which relays of riding or carriage ponies, or palanquin bearers, were laid out in stages. This was the speediest means of travel, and correspondingly expensive.

OLD TIME TRADE ROUTES AND HIGHWAYS AND MODES OF CONVEYANCE.

As mentioned elsewhere Dhanbad district previously was a dense forest area and contained practically no roads worth the name and the communications were hilly tracks and occasional stretches where light bullock-carts could move.

The Grand Trunk Road ascribed to Shershah was practically the first road to pass through this district. This road runs from Bengal to the Punjab. In the text on "History" there has been some description of Grand Trunk Road.

Mr. H. Coupland writes, "In 1854, so far as can now be ascertained, the only metalled road was the then new Grand Trunk Road, 43 miles of which, from the 149th mile at the Barakhar Bridge to the 192nd mile at the foot of Parasnath hill, lie within the district."*

As regards old trade routes Mr. H. Coupland mentions, "There are no canals or navigable rivers in the district. In pre-railway days the Damodar river was utilised during the rains for the despatch of coal, timber and other local products in small country boats or rafts, but the currents are so rapid and the bed so liable to changes that navigation was at all times difficult and dangerous, and now that railways provide safer and easier means of transport, practically no attempt is made to utilise this river."†

Previously water traffic on Damodar river was more important as this route was quicker and definitely safer. But this traffic was confined to the fringe of the area. There were more of highway men than river pirates. There were also the wild beasts. With the opening of the trans-State road known as the Grand Trunk Road,

* *District Gazetteer of Manbhum* (1911), p. 188.

† *Ibid*, p. 185.

trade and commerce started moving by this road and before the railways came this road had a very great importance. The opening of the railways had eclipsed the Grand Trunk Road for some decades. But with the development of the roadways in the country and an enormous expansion of the truck traffic, the Grand Trunk Road has become one of the most important arteries of trade and commerce in India. With wagon difficulties the Grand Trunk Road is now a very important link for coal traffic as well.

The hilly region had proved an obstacle for extension of the railway line. Till 1894 the present Grand Chord line of the East Indian Railway Company terminated at Barakar (West Bengal) only. Dhanbad was not connected by railways for a pretty long time. But with the development of the road communications and trade and commerce it was found necessary to connect Jharia coalfield area also by railway.

Conveyances have moved with the development of communications. The earliest were pack-ponies and light bullock-carts (*saggar*). Then when the Grand Trunk Road was largely used there came to be introduced regular bullock-cart trains run by the Government and then by private concerns. They were substituted by *push-push*, a light roofed cart drawn by men in front and pushed by man in the rear. *Push-push* conveyances used to have a change in the retinue every 10 or 15 miles. The road-side inns and shops (*chattis*) referred to elsewhere were a help to the development of roads and conveyances. The Government raised a few shelters for the conveyances and the passengers at convenient intervals on the Grand Trunk Road. The rich also used *palkis*, *khataulis* or *dolis* carried by bearers. They were the usual conveyances for ladies of the richer class. Ponies and elephants were also used but not to a very great extent. The roads were the rendezvous of thieves and dacoits. *Sowars* with naked swords used to accompany the bullock-cart trains. Magistrates with armed constables used to patrol portions of the roads. The *ghatwals* were charged with giving protection to the traffic, passengers and goods through the hill passes. Although maintained and financed by the State, the passengers would willingly pay the *ghatwals* extra or they thought the *ghatwals* would get them robbed.

With the introduction of motor vehicles there has been a tremendous change in the last two decades. Hundreds of trucks pass through this district everyday now. There are also cars, jeeps, pick-ups which are largely used to meet the present-day demand. Passenger buses, taxis, cycle-rickshaws have become very common. Cycles have become the poor man's car and also used for pretty long distance journeys. The air-field within 2 miles of Dhanbad is a small one and is used for the landing of small aircrafts.

From communications point of view Dhanbad district is highly developed and has got the best links of all the districts. The roadways and the railways have connected all the important points. The

Grand Trunk Road cuts the district from the east to the west into nearly two equal parts. The northern half is hilly area and has not got that incidence of development as the southern half.

The Forest Department has also been developing their roadways in the forest areas. The collieries are well connected by roads and railways. Waterways are not important now. The rivers and streams are hilly and normally dry up in the summer. The Damodar Valley Corporation's activities have given the district a few beauty spots and tourism has developed and is capable of further development.

Dhanbad, the district headquarters, is connected by metalled roads with the Grand Trunk Road. The meeting points are Barwa and Gobindpur which are 4 and 7 miles respectively from Dhanbad. As streams dry up after rains, *katcha* roads also become passable in fair weather for vehicular traffic. Owing to the easy availability of faster vehicles, the importance of bullock-carts has considerably declined although they still play an important role in the rural economy.

ROADS.

The public agencies for maintaining roads are the Central Public Works Department, the State Public Works Department, the District Board, the Municipalities, the *Panchayats*, the Forests and such private agencies as the collieries. The Central Public Works Department was maintaining the Grand Trunk Road previously but now they have made over this road to the State Public Works Department.

P. W. D. Roads.

These roads in Dhanbad district are under the jurisdiction of Public Works Division at Dhanbad. The P. W. D. roads including the National Highway, i.e., Grand Trunk Road come to 208 miles. The details are given below:—

Name of road.	Classification.	Mileage.
1. Grand Trunk Road	National Highway ..	48
2. Gobindpur-Chas-Jamshedpur Road (up to Bengal border).	Ditto ..	47
3. Gobindpur-Balliapur-Sindri Road ..	Central Road Fund ..	15
4. Dhanbad-Patherdih-Sindri Road ..	State Highway ..	16
5. Raghunathpur-Chandankiari-Chas Road.	Ditto ..	19½
6. Rajganj-Katras-Jamdiha Road ..	Ditto ..	12 miles and 2 furlongs.
7. Patherdih-Chandankiari-Baramasia Road.	Ditto ..	18
8. Giridih-Tundi-Gobindpur Road ..	Ditto ..	17½
9. Jharia-Balliapur Road (undertaken) ..	Ditto ..	17½

* These roads excepting no. 7 and no. 9 are pitched roads.

1. *The Grand Trunk Road*.—This is an old metalled road, connecting the district headquarters with Barwa and Gobindpur at 4 and 7 miles respectively. 45 miles of the most important National Highway in the country pass through the district. It enters the district from the district of Hazaribagh, and traversing the whole length of the district from west to east and dividing it nearly into two equal parts leaves it at Chirkunda. Topchanchi, Rajganj, Gobindpur, Nirsa and Chirkunda are situated on the road.

2. *Gobindpur-Chas-Jamshedpur Road (up to West Bengal border)*.—This is also a National Highway and starts from Gobindpur, passes through Dhanbad and Chas in this district. The road meets Ranchi-Purulia Road and ultimately connects Purulia in Purulia district (West Bengal) and then *via* Chandil (Singhbhum district in Bihar) goes to Jamshedpur (Singhbhum district). Only 47 miles of this road is in Dhanbad district.

3. *Gobindpur-Balliapur-Sindri Road*.—This road connects the township of Sindri 16 miles from Dhanbad with the Grand Trunk Road. Sindri has a fertilizer factory, a cement factory and the Bihar Institute of Technology. This road passes through Balliapur which has an Agricultural School and Farm.

4. *Dhanbad-Patherdih-Sindri Road*.—This road connects Sindri with Dhanbad and passes through Jharia, the most important business centre in the district. The old bridge over river Chas Nala has recently been replaced by a new bridge.

5. *Raghumathpur-Chandankiari-Chas Road*.—This road connects Hazaribagh district and Dhanbad district with Bengal through Chas and Chandankiari. The construction of the road has been completed except for the Chas By-pass Road which is still (1962) under construction.

6. *Rajganj-Katras-Jamdiha Road*.—This road connects Grand Trunk Road with Katras which is an important business centre in Dhanbad district.

7. *Patherdih-Chandankiari-Baramasia Road*.—This road connects the Patherdih coal washery project with Bengal and passes through Chandankiari. The construction of the road was taken in hand in 1961. The work is in progress (1962).

8. *Giridih-Tundi-Gobindpur Road*.—Only $17\frac{1}{2}$ miles of the road falls under Dhanbad district and the rest falls under Hazaribagh district. This road connects the Grand Trunk Road at Gobindpur with Tundi and Giridin. The work of the road had been taken in 1961 and the consolidation work was completed.

9. *Jharia-Balliapur Road*.—The construction has been undertaken. The road will connect Jharia with Balliapur and pass through many villages.

District Board Roads.

As a sub-district under Manbhum District Board with Purulia as its headquarters, Dhanbad had a Local Board under the District Board. This Local Board looked after the District Board Roads. Since 1956 when Dhanbad became a district there has been a District Board.

There are 80 roads under the District Board (1961-62) as follows:—

		Miles.	Furlongs.	Yards.
1. Metalled roads	..	87	0	108
2. Unmetalled roads	..	123	4	75 $\frac{3}{4}$
3. Village roads	..	144	3	120

The particulars are as follows:—

Serial no. Name and classification within bracket.

- 1 Approach road to Bhaga Railway Station (*pucca*).
- 2 Approach road to Gomoh Railway Station, Section I (*pucca*).
- 3 Approach road to Gomoh Railway Station, Section II (*pucca*).
- 4 Approach road to Katrasgarh Railway Station, Section I (*pucca*).
- 5 Approach road to Katrasgarh Railway Station, Section II (*pucca*).
- 6 Kusunda Railway Station approach road (*pucca*).
- 7 Mugma Railway Station approach road (*pucca*).
- 8 Pradhankanta Railway Station approach road (*pucca*).
- 9 Tetulmari Railway Station Road (*pucca*).
- 10 Bhaga-Bhowra Road (*pucca*).
- 11 Bhaga-Putki Road (*pucca*).
- 12 Dhanbad-Barwa Road (*pucca*).
- 13 Dhanbad-Katras Road (*pucca*).
- 14 Indian Colliery Owners' Association Road (*pucca*).
- 15 Dumra-Baghinara Road (*pucca*).
- 16 Nawagarh-Topchanchi Road (*pucca*).
- 17 Golakdih-Joyrampur Road (*pucca*).
- 18 Hirapur link road (*pucca*).
- 19 Jharia Station Road (*pucca*).
- 20 Jharia-Balliapur Road (*pucca*).
- 21 Jharia-Joyrampur Road (*pucca*).
- 22 Kapuria-Balliapur Road (*pucca*).
- 23 Katras-Moilkera Road (*pucca*).
- 24 Kenduadih-Jharia Road (*pucca*).

Serial no. Name and classification within bracket.

- 25 Kenduadih-Keshargarh Road (*pucca*).
- 26 Loop road at Dhanbad (*pucca*).
- 27 Luby Circular Road (*pucca*).
- 28 Moilkera-Kumarjuri Road (*pucca*).
- 29 Panchgarhi Bazar Road (*pucca*).
- 30 Sijua-Rajganj Road (*pucca*).
- 31 Nirsa-Kalubathan Road (*pucca*).
- 32 Mahuda Railway Station approach road (*pucca*).
- 33 Poddarpara Lane in Jharia Road (*pucca*).
- 34 Nirsa-Jamtara Road (*pucca*).
- 35 Poddardih-Kapasara Road (*pucca*).
- 36 Mandra-Barwabera Road (*pucca*).
- 37 Chirkunda Village Road (*pucca*).
- 38 Jamuniatand Railway Station approach road (*katcha*).
- 39 Barwa-Shankardih Road (*katcha*).
- 40 Gobindpur Village Road (*katcha*).
- 41 Katras Station Road (*pucca*).
- 42 Gobindpur-Pokhuria Road (*pucca*).
- 43 Cremation Ground Road (*pucca*).
- 44 Parbad Railway Station approach road (*pucca*).
- 45 Pokhuria-Lodhuria Road (*katcha*).
- 46 Chas-Telgaria Road (*katcha*).
- 47 Purulia-Mamurkudar Road (*katcha*).
- 48 Gobindpur-Nagarkinary Road (*katcha*).
- 49 Barwa-Kalubathan Road (*katcha*).
- 50 Dumra Village Road (*katcha*).
- 51 Kharni bridge-Mohanpur Road (*katcha*).
- 52 Chelyama-Kalubathan Road (*katcha*).
- 53 Tundi-Barwa Road (*katcha*).
- 54 Pipratand-Dumra Road (*katcha*).
- 55 Shankerdih-Poddardih Road (*katcha*).
- 56 Rajganj-Tundi Road (*katcha*).
- 57 Kherabera-Damodar Road (*katcha*).
- 58 Chirkunda Village Road (*katcha*).
- 59 Egarkur-Sirpura Road (*katcha*).
- 60 Chas-Bamaia Road (*katcha*).
- 61 Bilbera-Topchanchi Road (*katcha*).

Serial no. Name and classification within bracket.

- 62 Balliapur-Patlabari Road (*katcha*).
- 63 Hatsora-Barakar Road (*katcha*).
- 64 Pandra Village Road (*katcha*).
- 65 Poddardih-Ubchuria Road (*katcha*).
- 66 Kolhar-Palganj Road (*katcha*).
- 67 Latani-Chhota Ambona Road (*katcha*).
- 68 Nawatand-Barakar Road (*katcha*).
- 69 Pandrabezra-Lakrapahari Road (*katcha*).
- 70 Pokhuria-Lodhuria Road (*katcha*).
- 71 Pradhankanta-Damodar Road (*katcha*).
- 72 Kanchanpur-Telmucho Road (*katcha*).
- 73 Nagendranath Mishra Road (*katcha*).
- 74 Artah Village Road (*katcha*).
- 75 Roads under Chas Union Committee (*katcha*).
- 76 Katras-Topchanchi Road (*pucca*).
- 77 Bhojudila-Buribinore Road (*katcha*).
- 78 Nawatand-Hariharpur Road (*katcha*).
- 79 Sadhobad-Maniadih Road (*katcha*).
- 80 Charakpathar-Asanbani Road (*katcha*).

The expenditure by the District Board on *pucca, katcha* and village roads in 1961-62 were as follows:—

Classification of road.		Cost of original work.	Cost of repair work.
		Rs.	Rs.
1. <i>Pucca</i> road	..	88,963.40	2,50,768.99
2. <i>Katcha</i> road	..	33,359.64	59,545.91
3. Village road	..	1,66,864.76	68,114.65

Municipal Roads.

The Dhanbad Municipality maintains 14 miles of *pucca* roads, one mile of gravelled road and two miles of *katcha* but motorable roads. There are altogether 17 miles of roads in the municipal area. The condition of the roads is satisfactory.

The expenditure for the maintenance of the roads in 1962 was Rs. 9,132.95 for all *pucca, katcha* and gravelled roads.

Forest Roads.

The Forest Department has constructed its own roads for the purposes of extraction of forest produce and also for inspections.

The Dhanbad Forest Division has 62 miles 1 furlong and 4 chains of fair weather roads as follows:—

- (1) Topchanchi to Begnoria—35 miles 1 furlong and 2 chains.
- (2) Begnoria to Tundi—12 miles.
- (3) Rishibhita (on Begnoria-Tundi Road) to Meniadih—9 miles and 2 chains.
- (4) Begnoria to Birajpur—6 miles.

Total—62 miles 1 furlong and 4 chains.

Village Roads.

About 145 miles of the village roads are maintained by the District Board. Since the starting of the *gram panchayats* construction of roads in the villages has been taken up by some of the *panchayats*. The total length of roads made by the *gram panchayat* is not available. There are also a good length of village roads in big villages and coalfield areas in the district. Details of the length, etc., of the collieries roads are not available. The Community Projects and National Extension Service Administration are concentrating on village road construction by enlisting public co-operation.

VEHICLES AND CONVEYANCES.

The total number of bullock-carts registered under the Dhanbad District Board is 847 and under the Dhanbad Municipality is 768 in 1961-62. It is understood that there are many other carts in the district besides those registered. The number of cycles is increasing rapidly and now hawkers, milkmen and washermen generally use cycles for carrying their wares. There are 2,983 registered cycles in the municipal area of Dhanbad besides a large number of cycles which have evaded registration. There are thousands of cycles outside Dhanbad Municipality.

The number of cycle-rickshaws in the municipality is 396. Push-carts (*thelas*) are in general use for conveyance of very small lots of goods but no figure is available of their number. Figures of such vehicles outside Dhanbad are not available.

There are no horse-drawn vehicles in use within Dhanbad Municipality area. This is a unique feature in the State that a district headquarters has none. This shows the high incidence of urbanisation. Outside Dhanbad Municipality there are horse-drawn carriages and *tangas* for hire at Sindri, Maithon Chikunda, Kumardhubi, Chanch, Jorapokhar, etc. Cars and taxis are rapidly replacing other modes of conveyance. There are a large number of taxis as well for the conveyance of passengers. Buses both State and private, jeeps, etc., are plying in increasing number within and outside the district.

PUBLIC TRANSPORT.

As already stated there are a large number of privately owned buses and taxi services, besides Bihar State Transport Service buses in the district for conveyance of passengers not only within the district but also to and from other districts. Their number is on the increase.

There are trucks plying on hire which are registered in the different districts of the country. These trucks are used as carrier of goods not only within the district but also for export and import of different commodities from and into the district.

A number of routes including destinations beyond the district have been given to the private operators for running passenger buses. They are—

Serial no.	Names of the routes.	No. of parties holding permit.
1	Dhanbad-Jharia	6
2	Jharia-Katras <i>via</i> Kustore	6
3	Jharia-Katras <i>via</i> Dhanbad	4
4	Dhanbad-Bhowra <i>via</i> Jharia	3
5	Barwa-Bhowra <i>via</i> Dhanbad and Jharia ..	1
6	Dhanbad-Balliapur <i>via</i> Jharia	3
7	Dhanbad-Jairampur Colliery <i>via</i> Jharia ..	1
8	Dhanbad-Jinagora <i>via</i> Jharia	1
9	Dhanbad-Patherdih <i>via</i> Jharia	7
10	Dhanbad-Sindri <i>via</i> Jharia	8
11	Dhanbad Court-Sindri <i>via</i> Jharia	1
12	Dhanbad-Katras	3
13	Dhanbad-Phularitand <i>via</i> Katras	5
14	Dhanbad-Baghmara <i>via</i> Katras-Phularitand	1
15	Dhanbad-Chandrapura-Katras-Phularitand	6
16	Katras-Sindri <i>via</i> Jharia	3
17	Katras-Pokhoria-Chapakia	2
18	Katras-Tundi	1
19	Dhanbad-Tundi	1
20	Patherdih-Chirkunda	3
21	Topchanchi-Chirkunda <i>via</i> Katras-Jharia-Dhanbad.	1
22	Rajganj-Chirkunda <i>via</i> Katras-Jharia-Dhanbad	1
23	Dhanbad-Chirkunda	2
24	Dhanbad-Pokhoria	1

Serial no.	Names of the routes.	No. of parties holding permit.
25	Dhanbad-Gobindpur	1
26	Dhanbad-Balliapur <i>via</i> Gobindpur ..	1
27	Dhanbad-Panchet	1
28	Dhanbad-Baramasia <i>via</i> Jharia-Bhutrosia ..	1
29	Dhanbad-Baramasia	1
30	Dhanbad-Baramasia <i>via</i> Pindrajora-Chas-Talgoria.	1
31	Dhanbad-Chandankiari	2
32	Dhanbad-Talgoria <i>via</i> Chas	1
33	Chas-Bermo	1
34	Patherdih-Gomoh <i>via</i> Jharia-Dhanbad-Katras-Baghmara.	1
35	Jharia-Gomoh	1
36	Topchanchi-Chas-Marafari	2
37	Jharia-Gomoh	1
38	Patherdih-Topchanchi <i>via</i> Baghmara ..	1
39	Topchanchi-Gomoh	1
40	Berbendiaghat-Panchet-Kalubathan <i>via</i> Nirsa-Maithon-Chirkunda.	1
41	Panchet-Maithon <i>via</i> Chirkunda ..	1
42	Chirkunda-Kasiasol	1
43	Bhuli-Jealgora	1
44	Bhuli-Jogta	1
45	Bhuli-Jaggiwan Nagar	1
46	Dhanbad-Bhuli-Loyabad	1
47	Dhanbad-Rajganj <i>via</i> Jamadoba-Putki-Jharia-Katras.	1
48	Dhanbad-Rajganj <i>via</i> Jharia-Katras ..	4
49	Jharia-Topchanchi	1
50	Jharia-Kharagdiha <i>via</i> Tundi-Giridih ..	1
51	Jharia-Giridih <i>via</i> Dhanbad-Tundi ..	1
52	Bhaga-Giridih <i>via</i> Tundi	1
53	Dhanbad-Ramgarh	5
54	Ranchi-Dhanbad <i>via</i> Ramgarh-Gola-Chas..	1
55	Dhanbad-Asansol	
56	Jharia-Raniganj	Not available.
57	Dhanbad-Purulia	

The Bihar State Road Transport Corporation runs passenger buses on the following routes:—

Serial no.	Names of the routes.	Length of the routes. Miles.
1	Dhanbad-Sindri	16
2	Dhanbad-Baramasia <i>via</i> Chas-Chandankiari	38
3	Dhanbad-Gomeo <i>via</i> Bermo-Isri ..	82
4	Dhanbad-Panchet	32
5	Dhanbad-Bermo <i>via</i> Chas-Marafari ..	48
6	Dhanbad-Giridih	75
7	Dhanbad-Giridih <i>via</i> Barwa ..	75
8	Dhanbad-Gaya	146
9	Dhanbad-Aurangabad	156
10	Dhanbad-Imamganj	150
11	Dhanbad-Chatra	125
12	Dhanbad-Hazaribagh <i>via</i> Bagodar-Tatighari	80
13	Dhanbad-Hazaribagh <i>via</i> Berhi-Padma-Ichak	80
14	Dhanbad-Ranchi <i>via</i> Jhalda-Muri ..	110
15	Dhanbad-Ranchi <i>via</i> Ramgarh ..	110
16	Ranchi-Dumka <i>via</i> Dhanbad ..	202
17	Dhanbad-Jamshedpur	110
18	Dhanbad-Nawadah	146
19	Dhanbad-Patna	218
20	Dhanbad-Barouni	230
21	Dhanbad-Bhagalpur	146
22	Jharia-Giridih	71
23	Patherdih-Hazaribagh <i>via</i> Katras-Dhanbad-Rajganj.	Not available.
24	Dhanbad-Chouparan	92

Some of the long route buses ply in the night as the people do not want to waste their day. The coalfield workers are kept busy in the day and go home only in the evenings. The maximum number of passengers is on the days they get their wages. Approximately 20 to 25 thousand persons travel within the district daily by buses. Dhanbad buses are stationed near the railway station and the area hums with noise throughout twenty-four hours.

One peculiarity in this district is that the taxi charge per passenger is the same as the bus charge. All the taxis and buses are usually overloaded.

The statement showing the number of different vehicles on road for the last six years and fresh registration of motor vehicles obtained from the police office is given below:—

Year.	Busos.	Trucks.	Motor cars and jeeps.	Motor-cycles.	Taxis.	Auto rickshaws.	Traillers.	Total.
1	2	3	4	5	6	7	8	9
1956 ..	126	776	1,540	387	191	1	47	3,068
1957 ..	140	864	1,562	412	201	1	59	3,230
1958 ..	148	1,020	1,676	475	201	1	90	3,611
1959 ..	126	1,003	1,618	407	215	1	87	3,457
1960 ..	145	1,139	1,700	473	213	1	93	3,773
1961 ..	173	1,221	1,875	514	252	1	90	4,126
1962 (up to 31st March, 1962).	192	1,405	2,025	600	250	1	95	4,577

RAILWAYS.

The *District Gazetteer of Manbhum* (1911) mentions, "The East Indian Chord line was completed to Barakhar in 1858, and for the next 31 years communication with Calcutta and the outside world generally was *via* Barakhar or Raniganj.

"In 1894 the East Indian Railway Company extended their system from Barakhar to Jharia and Katras, so opening up the Jharia Coalfield area. Nine years later, in February, 1903, the Kharagpur-Gomoh section of the Bengal-Nagpur line was opened to goods traffic as far as Bhojudih, and in the following year for goods and passenger traffic as far as Mulkera, the complete length to Gomoh not being ready till January, 1907, thus affording another outlet for the products of the coalfield. In February, 1907 the Grand Chord of the East Indian Railway, which practically doubled the existing line through the coalfield and gave a direct outlet towards the North-West Provinces and Bombay, was opened

"The collieries are served by a network of loops, branches, and sidings taking off from the main lines of both the Bengal-Nagpur and East Indian systems, and the inter-connection of the systems at Gomoh, Katrasgarh and Jharia makes it possible for the colliery proprietor to despatch his coal to any part of India by the most convenient route.

"Further extensions of the railway system are in progress or contemplated. A direct line from Pradhankhunta on the Grand Chord to Patherdih at the extreme south-eastern corner of the coal-field is under construction, the intention being to relieve the congestion of eastward bound traffic which at present has to pass through Dhanbad."*

It may be mentioned that the direct line from Pradhankhunta to Patherdih which was under construction in 1911 has been completed long ago. The name of the Bengal-Nagpur Railway has been changed into South-Eastern Railway. The name of the East Indian Railway has since been changed into Eastern Railway.

There is a network of railway line in this district passing through colliery areas. Grand Chord lines of the Eastern Railway and branch lines of South-Eastern Railway pass through this district. From Gomoh Junction two railway lines one of the Eastern Railway and another of the South-Eastern Railway branch off, one going to Dehri-on-Sone (Shahabad) *via* Barkakana and another from Gomoh to Adra (Purulia district in West Bengal). There are branch lines in both the railways for carrying coal to different places in the country.

The district has four sections of the Eastern Railway and one section of the South-Eastern Railway. Most of the sections are utilised for carrying goods from the collieries. They are as follows:—

Eastern Railway.

- (a) *Kumardhubi-Gomoh Section.*—Kumardhubi to Gomoh forms part of the Grand Chord section. It was opened in 1894. It connects Dhanbad with Grand Chord main line running from Howrah to Delhi *via* Asansol, Gomoh, Gaya and Moghalsarai. The distance of the section is 68 kilometres. There are altogether 12 stations including Block Huts and Halt. They are Kumardhubi, Mugma, Thaparnagar Block Hut, Kalubathan, Chotta Ambona, Pradhankanta, Dhanbad, Bhuli Halt, Tetulmari, Nichitpur Block Hut, Matari and Gomoh.
- (b) *Pradhankanta-Patherdih Section.*—This section runs from Pradhankanta to Patherdih opened in 1913. There are four stations including Block Huts in between and the length is 15 kilometres. They are Pradhankanta, Rakhitpur Block Hut, Sindri Block Hut and Patherdih. These stations are mostly used for goods traffic.
- (c) *Dhanbad-Phularitand Section.*—This section goes from Dhanbad to Phularitand. This line was formerly

* *District Gazetteer of Manbhum* (1911), pp. 184-185.

extended to Katrasgarh only in 1894 but further extension up to Phularitand was made in 1926. It has a length of 21.6 kilometres and there are 12 stations including Halts in between the two. They are Dhanbad, Kusunda, Baseria Halt, Bansjora, Sijua, Angarpathra, Katrasgarh, Tentulia Halt, Sonerdih Halt, Tundu Halt, Budora Halt and Phularitand.

- (d) *Dhanbad-Patherdih Section*.—This section runs from Dhanbad to Patherdih opened in 1903. The length of this section is 15 kilometres. There are 12 stations including Halts. They are Dhanbad, Dhansar Halt, Baktakulha Halt, Nayakanali Halt, Jharia, Kujama Halt, Lodna, South Lodna Halt, Begdih Halt, Bararhi Halt, Patherdih Bazar Halt, and Patherdih.

The following are the colliery sidings on the following sections of the Eastern Railway:—

- (1) Kumardhubi-Gomoh Section—33.008 kilometres.
- (2) Pradhankanta-Patherdih Section—27.713 kilometres.
- (3) Dhanbad-Pradhankanta Section—44.708 kilometres.
- (4) Dhanbad-Phularitand Section—58.741 kilometres.

South-Eastern Railway.

Sudamdih-Gomoh Section.—This line runs from Adra (Purulia district in West Bengal) to Gomoh and connects this district with Purulia district (West Bengal). The length of this section is 41 kilometres. There are 12 stations including Block Huts. They are Sudamdih Block Hut, Bhowra Block Hut, Jamadoba South, Jamadoba North, Bhaga, Kerkend Block Hut, Loyabad, Malkera, Mahuda, Kharkhari Block Hut, Khanoodih and Gomoh.

There are other branch lines for carrying coal from Nichitpur to Katrasgarh and Malkera, from Malkera to Mahuda, from Mahuda to Chandrapura (Hazaribagh), from Kharkhari to Malkera, Kerkend to Jamada, Bhamaria to Sudamdih, from Kerkend to Bhowra, from Bhutgoria to Jamadoba, from Tetulmari to Kusunda, Jharia and from Pradhankanta to Patherdih.

Dhanbad Junction Railway Station had a comparatively miserable building in view of the importance of the station. The building was pulled down and a magnificent building was constructed in 1958. It is situated at a distance of 169 miles from Calcutta and is one of the most important railway stations on the Grand Chord line.

Dhanbad Railway Station comes under the Asansol Division of Eastern Railway. There is an office of the Divisional Superintendent (Transportation) at Dhanbad. The railway colony is an important part of the town occupying a big area. The railway colony has houses for about two thousand staff. It has its own water-supply, electric power house and hospital.

During 1962 the district has 99 miles of open line available for passengers and goods, the rest for colliery branches whose mileage is not available. For the convenience of passengers and other coaching traffic, 10 trains including two mail, four express including one air-conditioned bi-weekly and one weekly Janata Express and four passenger trains run each way over Grand Chord Section. On Gomoh-Sudamdih Section of the South-Eastern Railway two passenger trains run each way. Over the branch line section three trains run each way daily on Dhanbad-Jharia-Patherdih and three trains run each way daily over Dhanbad-Phularitand.

With a view to deal with increased coal traffic during 1962-63, the passenger services on Dhanbad-Patherdih and Dhanbad-Chandrapura Sections had to be reduced to three trains each way in consultation with the State Government.

ROLE OF RAILWAYS IN THE ECONOMIC LIFE OF THE DISTRICT.

The following are the main commodities which go out of the district through the Eastern Railway and the South-Eastern Railway:—Coal, coaltar, ammonium sulphate, superphosphate, cement, glassware, fire-bricks, electric goods including radio products, washed-coal, pig lead and silver, stone-chips, etc.

The following are the main commodities that come to the district from outside through the two railways:—Sugar, foodgrains, salt, spices, tea, cotton and woollen cloths, kerosene oil, petroleum, mustard oil, vegetables, fish, cosmetics and other luxury goods, cycles, radios, watches, crockeries, gypsum, lead ore, etc.

PASSENGERS AND GOODS TRAFFIC.

The outward and inward traffic of goods and passengers dealt with at the following stations of the Eastern Railway is indicated below*:

Stations.	Year.	Passengers.	
		Outward.	Inward.
1. Kumardhubi ..	1956-57	1,07,651	1,08,842
	1957-58	1,20,117	93,443
	1958-59	1,13,803	88,714
	1959-60	1,24,752	91,404
	1960-61	1,19,782	90,310
	1961-62	1,34,837	92,142

* Compiled from the weekly statements at the different railway stations. The authenticity of the statistics was not questioned.

Stations.	Year.	Passengers.	
		Outward.	Inward.
2. Dhanbad ..	1956-57	11,70,295	10,91,292
	1957-58	14,02,638	9,27,764
	1958-59	13,99,189	9,78,754
	1959-60	12,49,321	10,83,102
	1960-61	13,27,419	11,20,318
	1961-62	14,19,418	11,84,527
3. Gomoh ..	1956-57	2,24,339	2,79,374
	1957-58	2,59,188	2,07,625
	1958-59	2,68,372	2,00,562
	1959-60	2,74,259	2,14,352
	1960-61	2,79,219	2,10,131
	1961-62	2,81,054	2,14,592
4. Jharia ..	1956-57	1,01,321	87,444
	1957-58	1,40,471	1,55,146
	1958-59	1,04,671	1,30,125
	1959-60	1,02,321	1,29,485
	1960-61	1,03,104	1,31,011
	1961-62	1,04,309	1,32,032
5. Patherdih ..	1956-57	22,937	18,333
	1957-58	22,216	12,324
	1958-59	21,012	9,352
	1959-60	20,874	10,987
	1960-61	21,935	14,218
	1961-62	22,014	13,727
6. Katrasgarh ..	1956-57	1,71,850	1,13,090
	1957-58	1,66,947	1,45,740
	1958-59	1,49,635	1,36,734
	1959-60	1,38,945	1,40,831
	1960-61	1,45,879	1,39,882
	1961-62	1,57,983	1,41,309

Stations.	Year.	Goods.	
		Outward in tons.	Inward in tons.
1. Kumardhubi ..	1956-57	57,33,221	1,09,529
	1957-58	63,32,124	94,872
	1958-59	69,59,321	98,978
	1959-60	73,32,439	1,14,379
	1960-61	69,45,321	1,09,389
	1961-62	78,76,755	1,26,529

Stations.	Year.	Goods.	
		Outward in tons.	Inward in tons.
2. Dhanbad ..	1956-57	1,219	39,791
	1957-58	775	36,251
	1958-59	1,033	42,663
	1959-60	1,211	41,874
	1960-61	2,401	43,987
	1961-62	2,434	47,423
3. Gomoh ..	1956-57	16,332	17,799
	1957-58	19,644	18,457
	1958-59	15,182	12,611
	1959-60	14,093	10,987
	1960-61	15,321	11,302
	1961-62	15,321	10,417
4. Jharia ..	1956-57	20,394	39,509
	1957-58	18,503	64,090
	1958-59	23,124	80,100
	1959-60	19,432	72,109
	1960-61	27,042	91,423
	1961-62	30,325	96,435
5. Patherdih ..	1956-57	5,329	60,261
	1957-58	1,051	25,236
	1958-59	1,104	45,816
	1959-60	1,098	43,214
	1960-61	1,292	42,413
	1961-62	1,302	43,198
6. Katrasgarh ..	1956-57	1,55,451	11,855
	1957-58	10,882	18,127
	1958-59	9,499	17,450
	1959-60	10,132	15,952
	1960-61	98,498	17,321
	1961-62	10,434	19,526

RAIL-ROAD COMPETITION AND REGULATION OF TRANSPORT.

The railways are not adequate to handle all the passengers and goods to the different parts of the district and beyond and, therefore,

the importance of roads is no way less. The following zones have parallel rail and road connections:—

East of Dhanbad.—Dhanbad-Pradhankanta-Chhota Ambona-Kalubathan-Thaparnagar-Mugma-Kumardhubi.

West of Dhanbad.—Dhanbad-Bhuli-Tetulmari-Nichitpur-Matari-Gomoh.

South of Dhanbad.—Dhanbad-Dhansar-Bastakulha-Nayakanali-Jharia-Kujama-Lodna South-Lodna-Bagdigi-Bararhi-Patherdih Bazar-Patherdih.

The goods carried by trucks are mainly coal, cement, forest products, fertiliser, glassware, fire-bricks, electric goods, coaltar and stone-chips, on the outward journey. On the inward journey they carry light parcels, mill-made cloth, vegetables, cosmetics and luxury goods, spices, sugar, tea, petroleum, *ghee*, tobacco and chillies, etc.

The railways generally carry goods too heavy for carriage by trucks. They also carry such small parcels as answer-books of the examinees which are never carried by trucks as well as long journey parcels. Fish, vegetables, fruits and other perishable goods are sent both by trucks and railways.

There is a keen competition between rail and road transport between places connected both by railways and good roads, for transport by trucks is much quicker with less loss of time than by rail. It will not be incorrect to mention that the apathy and delay in the handling of goods by the railways had given an encouragement to the development of roadways and truck traffic. Since the last one decade there has been an enormous expansion of the roads within the district and beyond. There are a number of regular long distance truck services with headquarters in Calcutta and Delhi that will reach any consignment to the destination within three or four days. It has been humourously observed that these truck drivers drink like fish, drive like devil but they deliver the goods. The delay in booking parcels at railway station and the incidental troubles partially encourage the business to patronise the trucks. All these have forced the railway administration to reduce the freight and to run crack special goods trains.

For the easy and quick transportation of goods the Grand Chord on the Eastern Railway from Sitarampur (West Bengal) to Mughalsarai (U. P.) has been electrified and the energisation of different sections in Dhanbad district had been as under:—

1. Kumardhubi to Dhanbad—21st November, 1960.
2. Pradhankanta to Patherdih—21st November, 1960.
3. Dhanbad to Gomoh—1st February, 1961.

Consequent upon the increase in traffic envisaged in the Second Five-Year Plan, diesel engine operation on the Gomoh-Gaya Section was introduced at the end of 1957, thus replacing the steam traction, which had reached to a saturation point. In order to achieve economy in operation, the diesel traction was replaced by electric traction.

There has been complete reorientation of goods train operation with the introduction of electric crack specials on the Asansol-Dhanbad-Gomoh-Gaya Section. From Gomoh to Gaya about 28 goods trains are being run each way in addition to passenger service.

In spite of all those measures the railways have their own difficulty as the strength of the rolling stock is limited, the stock is subject to wear and tear and the railway tracks have to be used within restrictions owing to other trains on the line. The roads are there, for use throughout twenty-four hours. The bus services are also getting more streamlined in competition. They are sticking to timetable hours and fixed rates and better type vehicles have been introduced. There are now non-stop long distance express bus services. But the overcrowding has not been fully controlled.

There is ample scope for both the railways and the roadways to handle traffic, goods and passengers. The overcrowding of the passenger trains and the buses in the zones where both the systems run indicate that there is ample room for expansion of both the systems and the possibility of a healthy competition.

WATER TRANSPORT.

Water communication is not existent in the district as there are no canals or navigable rivers and moreover all the rivers are hill streams which dry up except during rains.

TRANSPORT BY AIR.

Dhanbad is not on the air route on any scheduled flight. There is only one small landing ground at Susnilewa which is situated two miles away from Dhanbad towards north maintained by the Public Works Department. The air strip is used by smaller planes, private or State.

There is no regular air service in this district. But private aeroplanes are allowed to use the landing ground on payment of charges leviable under the rules framed in 1952. This landing ground is serviceable throughout the year.

ROPEWAYS.

There are different aerial ropeways owned by the collieries in the district operating in the colliery areas. These are only meant for transportation of sand in the different collieries. Sand is an essential

requirement in the collieries for stowing. The following are the particulars of the different ropeways operating in Jharia Coalfield:—

Serial no.	Name of the ropeway.	Starting point.	Terminating and serving points.	Length of the ropeway (in metres).
1	Loyabad Ropeway	River Damodar (villages Jatudih, Ganeshadih, Jarma, and Potia, district Dhanbad).	1. Badroochuck Colliery 2. Mudidih Colliery. 3. Mudidih-Tentulmari Colliery. 4. Loyabad Colliery.	21,777
2	Sijua-Malkera Ropeway	River Damodar (village Tangabad, district Dhanbad).	1. Sijua Colliery .. 2. Malkera Colliery.	14,346
3	Potkeo-Kankanee Ropeway.	River Damodar (village Dhawardah, district Dhanbad).	1. Kankanee Colliery . 2. Potkeo Colliery.	22,265
4	Bhulanbararea Ropeway	River Damodar (village Bhanura, district Dhanbad).	Bhulanbararea Colliery.	4,000
5	Jealgora Ropeway	River Damodar (village Sutikdih, district Dhanbad).	Jealgora Colliery ..	4,800
6	Bagdigi Ropeway	River Damodar (village Dungri, district Dhanbad).	Bagdigi Colliery ..	6,402
7	Jamadoba-Digwadih Ropeway.	River Damodar (village Dungri, district Dhanbad).	Jamadoba and Digwadih Collieries.	4,810

DAK BUNGALOWS, INSPECTION BUNGALOWS AND REST HOUSES.

The rest houses maintained by the Public Works Department, District Board, Coal Mines Welfare Organisation, Forest Department, Jharia Water Board are shown in the tables that follow. They are available to the Government officials and non-officials on certain fixed charges. The number of tourists has gone up tremendously. In the holidays a large number of motorists from Calcutta visit these areas. The rest houses available are inadequate. They are furnished and at some of them cooks are available. Hoteliering has to be developed yet. There are no standard hotels even at Dhanbad. There are

about eight hotels which are of poor standard but even their charges are high. There are some *dharamshalas* at Dhanbad and Jharia and other places. But stay at the *Dharamshalas* is allowed free in two or three days but the comforts are nil.

The accommodation now available to the public is extremely inadequate particularly in Dhanbad, Jharia, Katras and Sindri.

This district has got excellent prospects for development of tourism. There are a number of places of attraction from various points of view like Maithon, Sindri, Topchanchi, Panchet, etc. Near the district is the Parasnath hill with a number of Jain *mandirs*. Within the district there are a number of industrial ventures some of which are well worth a visit. The fertiliser corporation at Sindri, the silver extraction at Tundu, the yachting at Maithon Lake, a peaceful stay at Topchanchi Lake House, shooting of wild animals in certain forest spots with permission are some of the attractions that this district can offer. The district headquarters Dhanbad is well connected with Purulia, Ranchi, Telaiya, etc., and hundreds of motorists usually pass through this area in the holidays. But unfortunately there are no youth hostels or cheap places of comfortable stay anywhere in the district excepting the Inspection and Dak Bungalows which are usually crowded by Government servants and not easily available to the public. The statement below gives the list of the rest houses available within the district:—

Serial no.	Name of the Bungalow.	Location.
------------	-----------------------	-----------

State Government Bungalows.

- | | | |
|---|------------------|----------------------------------|
| 1 | Circuit House | ... Luby Circular Road, Dhanbad. |
| 2 | Staging Bungalow | Near Collectorate, Dhanbad. |

P. W. D. Inspection Bungalows.

- | | | |
|---|--------------|--|
| 1 | Barwa | At mile 160 on Grand Trunk Road. |
| 2 | Kendua | At mile 170 on Grand Trunk Road. |
| 3 | Rajganj | At mile 180 on Grand Trunk Road. |
| 4 | Topchanchi | At mile 190 on Grand Trunk Road. |
| 5 | Chandankiari | .. Chandankiari. |
| 6 | Katras | Katras. |
| 7 | Sindri | Sindri. |
| 8 | Chas | Chas. |
| 9 | Dhanbad | Luby Circular Road, Dhanbad. |

Serial no.	Name of the Bungalow.	Location.
---------------	-----------------------	-----------

District Board Inspection Bungalows.

- | | | |
|---|--|--|
| 1 | Kapasara | At mile 153 on Grand Trunk Road and 24 miles from Dhanbad towards east. |
| 2 | Gobindpur | At mile 169 on Grand Trunk Road and about 8 miles from Dhanbad towards east. |
| 3 | Tundi | At mile 14 on Gobindpur-Giridih P.W.D. Road, 14 miles north of Grand Trunk Road from mile 169 towards north and 20 miles from Dhanbad. |
| 4 | Baramasia | At mile 1 on Kherabera-Damodar Road. |
| 5 | Dhanbad
(It has been converted into the residence of the Administrator, District Board, Dhanbad.) | |

Coal Mines Welfare Organisation's Bungalow.

Jagjiwan Nagar Rest House Jagjiwan Nagar (Dhanbad).

Forest Department's Rest Houses.

- | | | |
|---|----------------|--|
| 1 | Chas | At about 1 mile from Chas town on Chas-Purulia-Road. |
| 2 | Begnoria | At about 7 miles south of Rajganj miles 180 on Grand Trunk Road. |
| 3 | Maniadih | At Maniadih 3 miles south of Tundi. |

Jharia Water Board's Bungalow.

Topchanchi Water Board At Topchanchi near water Bungalow. reservoir.

POSTAL COMMUNICATION.

The Superintendent of Post Offices with headquarters at Dhanbad is the head of the Postal Department, which is under a Central Ministry. The Superintendent of Post Offices, Dhanbad Postal Division, is assisted by one Inspector having headquarters at Dhanbad. The total length of Postal Communication in 1962 is 946.37 kilometres in the district. The Postal Communication by railways is

222.37 kilometres, by motor buses 158 kilometres and by runners 566 kilometres in the district.

The Dhanbad Post Office is the Head Post Office. There are 42 Sub-Post Offices and 92 Branch Post Offices. The Sub-Post Offices in the district are: Bansjora, Bhaga, Bahgabab, Bhowra, Bhojudih, Bhuli, Chas, Chirkunda, Coal Mines Provident Fund (Dhanbad), Dhanbad Bazar, Hirapur (Dhanbad), District Superintendent of Education (Dhanbad), Dhansar, Domgorh, Fuel Research Institute, Gobindpur, Gomoh, Indian School of Mines (Dhanbad), Jagjiwan Nagar, Jealgora, Jharia, Jharia Bazar, Jharia Manbad, Katrasgarh, Katras Bazar, Khasjeenagora, Kumardhubi, Kusunda, Maithon dam, Melkera, Mugma, Mohuda, Nawagarh, Nirsachatti, Nudkhurki, Panchet dam, Patherdih, Saharpura, Sijua, Sindri, Sindri Institute and Tundoo.

Some of the Sub-Post Offices are served by direct rail communication (Railway Mail Service) and others are served by road through motors, buses or through runners.

The 92 Branch Post Offices are located at bigger and smaller villages and they serve the neighbouring villages. Some of the Branch Post Offices are located where there are Police-Stations and Block Offices.

In all the Post Offices including Branch Post Offices, ordinary postal transactions including money orders are conducted. Most of the Sub-Post Offices conduct Savings Bank business and also National Savings Certificates. National Savings Certificates are not sold at any extra Departmental Sub-Offices.

Many of the villages do not get more than one delivery in a week. The idea is to have a Post Office at every village which has a population of 2,000 persons. Attempt is being made to implement this.

The following statistics indicate the average weekly postal business done in 1961-62:—

- (1) Average weekly number of articles delivered—2,62,795.
- (2) Average weekly Money order issued—2,749.
- (3) Average weekly Money order paid—3,360.
- (4) Average weekly Savings Bank deposits—1,836.
- (5) Average weekly Savings Bank withdrawals—854.
- (6) Average weekly National Savings Certificates issued—314.
- (7) Average weekly National Savings Certificates discharged—42.

Telegraphs and Telephones.

There are 22 Postal Telegraph Offices from where telegrams can be sent and received in the district. They are, viz., Bansjora, Bhojudih, Chirkunda, Dhanbad Bazar, Dhansar, Gobindpur, Gomoh, Jealgora, Jharia, Katrasgarh, Kumardhubi, Kusunda, Maithon dam, Mohuda, Mugma, Nawagarh, Nirsachatti, Nudhurki, Panchet dam, Patherdih, Sijua and Sindri.

Telephones.

The opening of the Telephone Services has been a great boon to the merchants and Government officials. There are five Telephone Exchanges in the district, namely, Dhanbad, Jharia, Katrasgarh, Loyabad and Sinidih and 19 public call offices, viz., Dhanbad, Bansjora, Bhaga, Bhojudih, Chirkunda, Dhanbad Bazar, Dhansar, Gobindpur, Gomoh, Indian School of Mines (Dhanbad), Jealgora, Jharia, Katrasgarh, Kusunda, Mohuda, Nawagarh, Nirsachatti, Patherdih and Sindri. The details regarding telephone connections exchange-wise are as follows:—

Name of exchange.	Capacity.	Working connections.	Extensions.
1. Dhanbad	900	606	111
2. Jharia	900	590	151
3. Katrasgarh	300	241	39
4. Loyabad	200	159	45
5. Sinidih	125	106	26

Besides the abovementioned exchanges there are 16 Private Branch Exchanges in the district maintained by the different private concerns. The Postal Department has nothing to do with the working of these privately managed exchanges. The details regarding names, capacity, number of direct connections of the Private Branch Exchanges are as follows:—

Serial no.	Name of exchange.	Capacity.	No. of direct connections.
1	Maithon Executive Engineer Construction Division, D. V. C.	20	19
2	Maithon Executive Engineer Construction Division, D. V. C.	23	21
3	Chanchani and Worah (P.), Ltd., Dhanbad.	12	9
4	Chief Mining Engineer Hindustan Steel, Ltd., Saraidhela, Dhanbad.	25	10
5	M/s. Kalyanji Moyi & Co., Dhansar.	12	8
6	Central Mining Research Station, Dhanbad.	60	17

Serial no.	Name of exchange.	Capacity.	No. of direct connections.
7	Kumardhubi Engineering Works (P.), Ltd., Kumardhubi.	Not available	10
8	Fertiliser Corporation of India Unit, Sindri.	50	43
9	Lodna Collieries Co., (1920), Ltd., Post-Box no. 135, Jharia.	10	8
10	Director Fuel Research Institute, Jealgora.	20	15
11	Director East Bhagatdih Colliery Co. (P.), Ltd., Jharia.	12	9
12	Chief Mining Engineer East Indian Coal Co., Ltd., Jealgora.	25	20
13	M/s. Bird and Co. (P.), Ltd., Sijua.	28	24
14	Asiatic Oxygen and Acetylene Co., Ltd., Dugda.	12	6
15	Bharat Mining Corporation, Ltd., P. O. Kharkharee (Dhanbad).	12	6
16	Kalyanji Morji and Co., Bengal Coal Co., Ltd., P. O. Mohuda (Dhanbad).	4	3

Radio and Wireless.

There is no broadcasting station in the district. People are getting radio-minded. The number of licensees for radio in Dhanbad district for 1961 is 10,756. Now the shops have a radio set not to speak of the restaurants and cheap hotels. The Public Relations Department has distributed 169 radio sets till 1962 to selected rural libraries at a reduced rate.

The police has one wireless station at Dhanbad. It is meant for administrative purposes only.

ORGANISATION OF OWNERS AND EMPLOYEES IN THE FIELD OF TRANSPORT AND COMMUNICATIONS.

Dhanbad district has got one association of bus owners. It has 51 members and is affiliated to Bihar Bus Owners' Association, Ranchi but it is a non-registered association. In the face of the large number of buses that have Dhanbad as the starting point and another large

number of buses that pass through Dhanbad, this association has an important role to play. The association looks after the interest of the transport owners.

The employees in bus transport service have also got three associations to look after the interest of the employees in transport. The details of the unions are as follows:—

Serial no.	Name of the Union.	Registered no.	Date of Registration.	Affiliation with Central Organisation.
1	Motor Workers' Union, Naya-bazar (Dhanbad).	100	26th June, 1946	Hind Mazdoor Sangh.
2	Damodar Ropeway Labour Union, P. O. Nadkhurkee, (Dhanbad).	556	30th April, 1952	Indian National Trade Union Congress.
3	Dhanbad Paribahan Karam-chari Sangh, Dari Mohalla (Dhanbad).	934	11th January, 1960	United Trade Union Congress.

CHAPTER VIII.

ECONOMIC TRENDS.

LIVELIHOOD PATTERN.

For a correct appraisal of the economic trends of this district we have to draw largely from what has been mentioned in other chapters of the book, particularly People, Agriculture, Industries, Trade and Commerce. As mentioned before, the economic importance of this district is due to large reserves of coal distributed in the three fields, the Jharia and Chandrapura coalfields, and the Barakar series which extend into the Raniganj coalfields in West Bengal. The total output of coal in this area accounts for about fifty-five per cent of the total coal output of India. The total reserve of coal in the Jharia coalfields is estimated at 5,000 million tons. Chandrapura coalfields contain nine coal seams and the total coal reserve is estimated at 50 million tons only. Refractory clays are also found in beds associated with the coal seams and the best clays occur in Barakar series. They are converted into refractories in several factories of this district and these refractories products can compete favourably with the best products from other countries. The fire-clays are also used for the manufacture of potteries. Coal and the allied industries are the most important basic facts for determining the economic trends of the district.

GROWTH OF POPULATION.

Dhanbad district has the smallest area as compared to other districts of Bihar. But the population has been rising rapidly since 1881 due to industrial expansion encouraging large-scale immigration to this area. The 1891 Census disclosed an increase of 12.6 per cent over the population as censused in 1881. In the next decade (1891–1901) there was rapid development of the mining industry in Jharia coalfields, and the population of Jharia *thana* increased by 75 per cent and that of Topchanchi by 30 per cent. In the total area as a whole, the population increased by 25.1 per cent. The increase was due chiefly to influx of immigrants from Hazaribagh and other places in Bihar and Uttar Pradesh. During 1901–1910 there was a virulent epidemic of cholera in the coalfields in 1908, but otherwise the decade was healthy. Meanwhile the development of coal mining continued apace, and the number of immigrants increased by about eight thousands. It is hardly surprising, therefore, that the 1911 Census registered a further increase in population by 38.6 per cent. In 1911–20 decade there were epidemics of cholera almost every year from 1913 to 1919, and large mortality from the influenza epidemic in 1918 and 1919, but with further development of the coalfields the volume of immigration had increased greatly. The Census in 1921 showed an increase of 18.2 per cent. In the following decade (1921–1930), population

increased by 14.8 per cent only, though, as in other districts, there was remarkable improvement in public health in this decade, and mortality from cholera and small-pox had diminished greatly. The fall in the rate of population growth during this period as compared with the unhealthy 1921-1930 decade was due to the slowing down of the flow of immigrants as a result of the serious trade depression which started in 1929 and caused a big slump in the coal industry.

In the next decade (1931-40), the incidence of public health was even better than during 1921-30. The slump in the coal industry, however, continued till the very close of the decade. The 1941 Census showed an increase in population of only 11.9 per cent, the lowest increase ever recorded in Dhanbad sub-district since 1872. The relatively modest increase in population during this decade was due no doubt to the virtual stoppage of further immigration.

In the decade 1941-50, the population increased by 25.6 per cent which indirectly testifies to the tremendous industrial development that has taken place in this area during the last decade. The coal industry developed rapidly under the stimulus of increased demand for coal due to war and rise in prices. The Damodar Valley Corporation built a large power house near Maithon in 1949. A huge fertilizer factory was set up at Sindri which developed into a town of moderate size in less than a year. A large number of minor industries have also been set up in or near Dhanbad and in the vicinity of coalfields. The large increase is mostly due to immigration. Out of a total population 7,31,700 in 1951 (of pre-organised Dhanbad) 2,33,652 were immigrants.

The following figures show the percentage of variation in different revenue *thanas* during last two decades:—

District and Revenue <i>thana</i> .	Population, 1951.	Percentage variation.		Density, 1951 (per sq. mile).
		1931-1941.	1941-1951.	
Dhanbad (sub-district)	7,31,700	11.9	25.6	924
Govindpur	64,648	18.0	7.8	544
Jharra	3,34,771	10.1	43.5	1,924
Topehanchi	1,60,065	8	15.0	925
Nirsa	1,21,897	18.1	22.3	704
Tundi	50,319	12.8	0.7	330

Source.—*Census of India, 1951, Vol. V., Bihar, Part I.*

From the perusal of above figures it becomes clear that during the decade 1941-50, the largest incidence of increase in population has taken place in Jharia. This is as expected, as in Jharia are located most of the important coalfields as also the Sindri Fertilizer Factory. Govindpur which is mainly an agricultural tract, has actually suffered a small decrease in population due probably to temporary movement of labourers to the coalfields and other places.

URBANISATION.

Industrialization brings in urbanisation. The population of Dhanbad town (including both the municipal area and the railway colony) increased from 12,951 in 1921, when it was treated as a town for the first time to 34,077 in 1951, the net increase in 30 years being 21,126 or 163.7 per cent. The present population of Dhanbad town is 57,473 which means an increase of 68 per cent during the last decade. Jharia which is only a few miles from Dhanbad was raised to urban status in 1941. Its population has increased from 8,037 in 1941 to 26,481 in 1951 and to 33,805 in 1961. Sindri, which was first time included in the list of towns in 1951 Census, had a population of 13,045 in 1951 which has increased to 41,349 in 1961. Starting with the decade 1921-31 variation in urban and rural population of Dhanbad district has been of the following order:—

Percentage Variation and Density of Population.

		Rural,	Density of population.	Urban.	Density of population.
		Per cent.		Per cent.	
1921-31	..	+ 14.2	..	36.6	..
1931-41	..	+ 7.7	..	141.2	..
1941-51	..	+ 21.1	849	86.6	4,904

Source.—*Census of India*, Vol. V, Bihar 1951, Part I.

These figures show that rate of increase in population has been faster in urban areas than in the rural areas. This is due to the development of mining and manufacturing industries in some parts of this district. Further urbanisation in this district has been essentially a townward migration specially of the male population.

Prior to the reorganisation of boundaries of this district in 1956, the rural-urban ratio of population of this district was 9 : 1. Out of the total population of 7,31,700 the rural population was 6,58,098 as against the urban population of 73,602. After reorganisation of boundaries of this district in 1956, the rural-urban ratio

of population shifted to 10 : 1 as out of a total population of 9,05,783 of reorganised Dhanbad, 8,22,693 is the rural population as against 83,090 as the urban population. The reason for the shift is in the inclusion of two village oriented *thanas* of Chas and Chandankiary in this district. According to the *Handbook of Statistics of Reorganised Bihar*, 1956, this district has 1,627 villages and four towns, namely, Dhanbad, Sindri, Jharia and Chas. Seven non-agricultural places with a population of more than 5,000 each were treated as villages. These places are Sijua, Loyabad, Chaitudih, Dumurkunda, Jorapokhar, Bhowrah, Jamadoba—having a preponderance of non-agricultural occupations. In 1961 Census these places were treated as towns. The provisional population figures of 1961, published by the Ministry of Home Affairs show that number of towns in this district is nineteen. Due to this, there has again been a shift in the rural-urban ratio and at present out of a total population of 11,58,363, rural population is estimated to be 8,68,022, and urban population 2,90,341. This brings the ratio of rural-urban population to 3 : 1. Even though a portion of this shift is attributable to the change in the definition of a town which has resulted in increase in the number of towns, the growing trend of urbanisation in the district is marked. This growing and marked trend towards urbanisation is mainly due to increased non-agricultural openings and immigration of rural people to urban centres in search of fruitful employment. It seems that in course of subsequent years, with the emphasis on industrialization, the rate of urbanisation would be further speeded up. Therefore, a planned programme of urbanisation, which would concentrate on the development of suburbs and on the construction of towns and cities in newly developed areas is of vital importance.

DENSITY OF POPULATION.

So far as density of population is concerned this district can be divided into two zones—(1) industrial zone and (2) agricultural zone. The industrial zone consists of the Jharia, Kenduadih and Chirkunda police-stations and contains 20 per cent of the total area of the district and accounts for more than 40 per cent of total population. The average density of population of this zone is 1,915 persons per square mile (according to 1951 Census) which goes up to 5,500 per sq. mile in Jogta and Jharia police-stations. The agricultural zone which consists of Govindpur Revenue *thana*, Balliapur, Topchanchi, Baghmara, Tundi and Nirsa accounts for about 80 per cent of the area and 60 per cent of the total population. In this agricultural zone, the average density of population is 573 persons per sq. mile and goes down to 330 persons in Tundi though it rises up to 900 persons per sq. mile in Baghmara and Balliapur which are closer to the industrial belt. This shows that industrial regions are supporting larger population per sq. mile as avenues for fruitful employment are available. Further, agricultural region which consists of

80 per cent of the total area of the district supports only 60 per cent of the total population and this makes the burden on agriculture lesser in comparison to that of the other districts of Bihar, particularly Saran, Champaran, Muzaffarpur, Darbhanga, Monghyr and Patna. Apart from this, as 1961 Census has revealed, the growth of population in industrial regions within this district has been much more than that in agricultural districts in the decade 1951-60. For example while the population has recorded 250 per cent increase in Jharia police-station, 350 per cent increase in Dhanbad police-station, it has recorded only 6 per cent to 10 per cent increase in Govindpur, Balliapur and Tundi police-stations.

Prior to the reorganisation of boundaries in 1956, Dhanbad was the only district unit where non-agricultural population outnumbered the agricultural population. Roughly 52 per cent of the total population derived their livelihood from non-agricultural occupation. After reorganisation of boundaries in 1956, two agricultural regions, Chas and Chandankiary have been added to the population of this district and the percentage of population dependent on non-agricultural occupations has decreased to 44 per cent. This occupational pattern varies from one region to another within the district. As mentioned before, in the central zone, which is an industrial zone, non-agricultural occupations account for 82.1 per cent of the total population in that zone, whereas in remaining agricultural regions of Govindpur, Baghmara, Topchanchi, Balliapur, Tundi and Nirsā 84.5 per cent of the population derive sustenance from agricultural pursuits. Tundi revenue *thana* is a purely agricultural tract where 98.2 per cent of the residents are agriculturists. On the other hand 99.4 per cent of the population of Jharia police-station are profitably employed in non-agricultural pursuits.

According to the *Handbook of Statistics of Reorganised Bihar, 1956* the distribution of population into different livelihood classes is of the following pattern:—

Economic Status.

Principal livelihood classes.	Self-supporting persons.	Dependents including both earning and non-earning dependents.	Total of columns 2 and 3.	Percentage of total population.
Agricultural classes . .	175,411	335,227	510,638	56.27
1. Cultivators of land wholly or mainly owned and their dependents.	153,169	295,146	448,315	49.49
2. Cultivators of land wholly or mainly unowned.	5,358	12,232	17,590	1.54
3. Cultivating labourers and their dependents.	16,884	24,231	39,285	4.33

Principal livelihood classes.	Self-supporting persons.	Dependents including both earning and non-earning dependents.	Total of columns 2 and 3.	Percentage of total population.
4. Non-cultivating owners of land, agricultural rent receivers.	1,830	3,618	5,448	0.91
Non-Agricultural Classes ..	188,843	206,302	395,145	43.75
5. Production other than cultivation.	127,640	120,216	247,856	27.37
6. Commerce	18,137	22,997	41,134	4.54
7. Transport	10,141	18,433	28,574	3.15
8. Other services and miscellaneous source.	32,925	44,656	77,581	8.67
Total ..	364,254	541,529	905,783	100

From the perusal of the above figures it is apparent that 3.64 lakh persons are self-supporting persons, i.e., who are in receipt of some income in cash or kind, which is sufficient at least for their own maintenance. This constitutes roughly 40 per cent of the total population. The balance of 60 per cent of the total population is dependents consisting of earning dependents and non-earning dependents. The proportion of self-supporting persons is higher here than elsewhere on account of the presence of large number of able-bodied colliery labourers all of whom earn their own living but in many cases their family members and dependents are not living with them. As might be expected, the proportion of self-supporting persons is much higher among the non-agricultural population. The figures given below show the distribution of 100 persons of the general, agricultural and non-agricultural classes by their economic status:—

	Self-supporting person.	Dependents (earning and non-earning).
General	40	60=100
Agricultural	34.3	65.7=100
Non-Agricultural	47.7	52.3=100

Again, the following figures give the distribution of 100 of the general, the self-supporting and the dependent persons into different livelihood categories:—

	Agricultural.	Non-Agricultural.
General	56.27	43.73
Self-supporting	46	54
Dependents	60	40

An analysis of the distribution of population into different livelihood classes according to economic status based on these tables indicates that the proportion of self-supporting persons is higher in non-agricultural occupation and comes to 54 per cent of the total self-supporting population. So far as the dependents are concerned, again, it is non-agricultural population that has to support less since non-agricultural population has to support only 40 per cent of the total dependent population. Inevitably agriculture in this district has lesser avenues for substantive employment and which is at the same so hard pressed with dependents. The result is that the *per capita* income and standard of living is worse among the agricultural population as compared to the non-agricultural or industrial sectors.

So far as agriculture is concerned, Dhanbad is mainly a rice-producing tract and 30 per cent of the total geographical area is under paddy cultivation. About 12 per cent of the land is put to non-agricultural uses. Only 3 per cent of the area is sown more than once. In agriculture, the main source of livelihood is paddy cultivation as except a few thousand acres that is put under production of maize, *arhar* and sugarcane, rice is the principal crop of this district. The very name of this district owes its origin to the cultivation of *dhan* (paddy).

Industry is another main source of livelihood. According to *Dhanbad District Census Handbook of 1951*, there are 138 factories in Dhanbad registered under the Factories Act. There are 69 rice, flour, oil and *dal* mills, five icecream, ice candy and cold storage factories, eight saw milling factories, eight ceramic and pottery factories, seven glass and glassware factories, three bricks, lime and *surkhi* factories, one iron and steel works, eight automobile and coach building factories, one radio engineering factory, 10 printing and binding factories, four coke plants, 14 foundry and general electrical engineering works and one each, lead, coal-tar, aluminium and soap factories. The number of persons employed in these factories were 14,391 persons of which 47 per cent accounted for ceramic and pottery factories. So far we have not considered mining and quarrying industry which alone is responsible for the employment of 1,39,246 persons in its 429 working mines at present (Ref: *Coal Bulletin*, April, 1961). Apart from this there are village and small-scale industrial establishments numbering 745 (in 1951) which provide employment to 1,935 persons. These include weaving, milling of cereals, bicycle-repairing, carpentry, soap making, biri-making, pottery-making industries, etc. Cotton textile establishments employ 1,126 persons. The number of non-textile establishments is 201 employing 809 persons. Amongst those employed in these small-scale and cottage industries, 1,340 persons are whole timers and 595 persons are part timers. The recent figures are not available and those mentioned are sub-district figures as mentioned in *District Census Handbook of 1951*. There may also have been some omissions.

It is, however, important to note that most of the handlooms in textile establishments occur in agricultural regions of the district. Govindpur has 279 handlooms which employ 568 whole timers and seven part timers. Thus in Topchanchi, cottage industries provide part-time occupation to local agriculturists whereas in Govindpur there is a class of persons employed whole-time in cottage industries. Nirsa has 114 handlooms and here again whole timers are only six whereas part timers are 299 persons. Chirkunda has 19 handlooms where 68 part timers only are employed and Jorapokhar has 11 handlooms where 18 whole timers and three part timers are employed. Apart from these textile establishments, milling of cereals in this district employs 204 whole timers and 45 part timers; motor and cycle repairing industries employ 131 whole timers and seven part timers; manufacturing of electrical appliances employ 68 whole timers and two part timers; soap factory employs 58 whole timers and two part timers and carpentry industry employs 79 whole timers.

From the above discussion it is apparent that the existing industries are absorbing a large portion of the working population and hence the burden on agriculture is much less than in other districts of Bihar. There is a heavy weightage for industrial economy and the further tapping of the industrial potentiality of this district will bring in more people deriving their livelihood from industries. Not only that, those engaged in industries are economically active self-supporting persons with a higher standard of living. Further, due to availability of opportunities in industries particularly in coal mines, the class of peripatetic labourers is not as prominent as in other districts of Bihar.

The total number of persons dependent on commerce is 41,134 out of which 18,137 are self-supporting persons and 22,997 are dependents—earning and non-earning. Thus on the whole 4.54 per cent of the total population is dependent on commerce. The chief commodities of import are foodstuffs, textile and leather goods, fuel, machinery and equipments. Mineral products constitute main items of export including coal and coal products, refractories, pottery and ceramics, glass products, machineries and others. Recently coal trade has received a setback due to shortage of wagons and bottleneck in matter of transport.

Twenty-eight thousand five hundred and forty-seven persons or 3.15 per cent of total population is dependent on transport of which 10,141 persons are self-supporting and 18,433 persons are dependents. In other services and miscellaneous sources 32,925 persons are self-supporting and 44,656 persons are dependents. Domestic servants, barbers, launderers, hotel-keepers, religious services, lawyers, persons employed in education, health and medical services and all employees of the Central and State Governments and of local bodies come under

this group. Beggars and vagrants are also included in this category. Taken as a whole, 47.7 per cent of non-agricultural population is economically active and 53.3 per cent are dependents.

LEVEL OF WAGES.

Trend in wages can be studied under two heads—agricultural wages and industrial wages.

The statistics of agricultural wages are very unsatisfactory in our country and till recently no such data were collected on a uniform basis. Generally landless people who reside in villages offer themselves for agricultural labour. The cultivators who possess a large area of land require to engage labour for agricultural operations. Small cultivators who own little land do not engage labour and they themselves do the agricultural work with the help of family members in their field. There are two types of labourers engaged for agricultural operations—one is of permanent nature, the other is of casual nature. Further, heavy agricultural operations like ploughing are done by the male labourers, while lighter work, such as transplanting and reaping are shared by women. In agricultural regions of Dhanbad out of every 10,000 persons of all agricultural classes, 8,868 persons are cultivators of land wholly or mainly owned and they have their dependents. Thus about 90 per cent of agricultural population are owners of land though the size of most of agricultural holdings (70 per cent) are of less than 2 acres. Landless labourers constitute only 6 per cent of agricultural population and 3 per cent of total population in this district. Hence, neither the demand nor the supply of agricultural labour is great. Employment is mostly of seasonal nature and with alternative means of occupation open in industries and coal mines and construction works, agricultural labourers prefer to work in cultivation work temporarily during the sowing and harvesting season only.

In past, agricultural wages were mostly paid in kind; not only that, agricultural wages were very cheap. *Manbhum District Gazetteer of 1911* gives statistics of daily wages in 1911 (in which year a wage census was held in the month of April). Though wages were actually paid in kind, for the purpose of convenience those were calculated in rupees and annas. A ploughman was generally paid in grains worth $2\frac{1}{2}$ annas to 4 annas per day. A carpenter was paid 5 to $5\frac{1}{2}$ annas per day. A *gharami* was paid 4 to $4\frac{1}{2}$ annas per day and a blacksmith 6 to 7 annas per day. Agricultural labourers were hardly appointed on permanent basis.

To ascertain the current rural wages a sample survey was done in 1958 and the data collected are available in the *Quarterly Bulletin of Statistics* published by the Government of Bihar. Following are the figures showing daily agricultural wages in rupees and *naiya paisa*

in a selected village in Dhanbad district during October, 1958, November, 1958 and during December, 1958:—

Rural Wages in Dhanbad in 1958.

Nature of job.			October, 1958.	November, 1958.	December, 1958.
			Rs.	Rs.	Rs.
Skilled labourers ..	Carpenter ..	..	3.25	3.25	2.87
	Blacksmith..	..	2.75	2.75	2.75
Unskilled labourers, and field labourers.	Ploughman, Men ..		1.50	1.50	1.50
	sower, Women		1.25	1.25	1.25
	transplanter, Children		0.75	0.75	0.75
	weeder and reaper,				
Other Agricultural labourers, Men ..			1.50	1.50	1.50
	coolies, load carriers, well-diggers, Women		1.25	1.25	1.25
	etc. Children		0.75	0.75	0.75

If we compare the increase in level of wages with increase in level of prices, we shall find that wages have increased to commensurate with increase in price level. Up to the year 1939 wages remained cheap due to the fact that the prices especially of consumers' goods were not high. But with the start of the decade 1941-50 consumers' prices began to rise and cost of living increased. Wages started increasing—both of the skilled and field labourers. If consumers' prices have increased sevenfold in between 1914-1958, wages of field labourers and blacksmith have increased sixfold. However, in this increase, carpenters have been immensely benefited. Their wages have increased tenfold in between 1914 and 1958 which is presumably due to increased demand for carpenters in furniture and allied industries.

Industrial Wages.

Dhanbad is a rich industrial region and hence the trend in industrial wages, particularly in coal mines should receive our particular attention. The Annual Report of the Chief Inspector of Mines gives data on the wages of labourers in coal mines. Following are the average weekly cash earnings of labourers in coal mines of Jharia in Dhanbad:—

Average weekly cash earning of colliery workers : July, 1961.

Nature of work.	Name of coalfield.	
	Jharia.	Indian Union.
	Rs.	Rs.
<i>Below ground—</i>		
Overmen and sirdars ..	41.47	41.21
Miners and loaders ..	22.74	23.31
Others	23.47	22.90

Nature of work.	Name of coalfield.	
	Jharia.	Indian Union.
	Rs.	Rs.
<i>Open cast workings—</i>		
Overmen and <i>sirdars</i> ..	34.15	34.20
Miners and loaders ..	21.68	21.91
Others { Men ..	19.17	19.77
{ Women ..	18.81	18.93
<i>Above ground—</i>		
Clerical and supervisory staff	45.47	42.56
Men	21.84	21.46
Women	19.07	19.15
Overall	23.86	23.39

SOURCE—*Monthly Coal Bulletin*, July, 1961 issued by the Chief Inspector of Mines, Government of India, Ministry of Labour and Employment.

These weekly cash earnings consist of three components, i.e., basic wages, dearness allowance and other cash payments. Following are the components of weekly earnings in Jharia and Raniganj coal mines:—

Average weekly cash earnings of workers by components.

				Basic wages.	Dearness allowance.	Other cash payments.
				Rs.	Rs.	Rs.
Bihar—Jharia—Below ground—						
Overmen and <i>sirdars</i> ..	..	..	..	20.72	10.04	4.11
Miners and loaders ..	..	..	..	8.62	11.56	2.56
Others ..	..	..	..	8.94	12.25	2.28
<i>Open cast workings—</i>						
Overmen and <i>sirdars</i> ..	..	..	..	15.94	15.31	2.90
Miners and loaders ..	..	..	..	8.33	11.81	1.84
Others { Men ..	..	..	..	6.93	10.82	1.42
{ Women ..	..	..	..	6.70	10.87	1.24
<i>Above ground—</i>						
Clerical and supervisory staff	..	..	..	24.47	17.70	3.30
Men .. ..	..	..	..	8.47	11.86	1.51
Women .. ..	..	..	..	7.10	10.53	1.44
Overall .. ..	..	..	..	9.22	11.97	2.14

				Basic wages.	Dearness allowance.	Other cash payments.
				Rs.	Rs.	Rs.
Bihar—Raniganj—Below ground—						
Overmen and <i>sirdars</i> ..	..	..	..	19.49	14.97	4.10
Miners and loaders ..	..	..	..	8.20	11.31	3.71
Others ..	..	..	..	8.18	10.70	2.62
Open cast workings—						
Overmen and <i>sirdars</i> ..	..	..	..	15.30	13.20	2.02
Miners and loaders ..	..	..	..	7.97	12.16	4.41
Others	Men	..	..	8.28	11.81	1.60
	Women	..	..	7.17	13.48	1.20
Above ground—						
Clerical and supervisory staff ..	..	..	..	17.56	13.92	1.91
Men ..	..	..	..	7.93	10.53	2.00
Women ..	..	..	..	7.12	10.32	1.75
Overall ..	..	..	..	8.64	11.30	2.92

From the perusal of the above figures it will be seen that a large portion of the earnings of the colliery workers consists of Dearness Allowance which increases with the increase in consumer's price and working class cost of living indices. At present (1962) Dearness Allowance forms more than 50 per cent of total emoluments in coal industry. Thus Dearness Allowance is often larger than the basic wage. The total emoluments of labourers in coal industry have recorded 217 per cent increase in between 1951 and 1960. According to the Annual Report of the Chief Inspector of Mines for 1960, the indices of increase in labour earnings are as follows:—

Index of labour earnings.

Index—Jharia.				Base—December 1951=100.
1951	December	..	..	100
1952	"	..	..	107.5
1953	"	..	..	107.8
1954	"	..	..	112.4
1955	"	..	..	113.2
1956	"	..	..	159.9
1957	"	..	..	173.7
1958	"	..	..	195.8
1959	"	..	..	213.7
1960	"	..	..	217.0

It is interesting to note that the index of labour earnings has shown marked upward trend only after 1955. During the First Five-Year Plan period (i.e., up to 1955) price level was relatively stable and labour earnings also remained stable but after 1955 commensurate with marked upward trend in price level, labour earnings increased as Dearness Allowance to workers in coal industry is positively linked up with price level.

LEVEL OF WAGES IN MANUFACTURING INDUSTRIES.

Level of wages in manufacturing industries has shown marked upward trend in between 1947–1960. Basic wages in lead industry have doubled during the past decade. This is true whether we consider the minimum or the maximum of the basic wages. Up to 1959 no Dearness Allowance was paid to unskilled labourers in lead industry. They were paid only annas 2 per attendance as an allowance. But after 1959, Dearness Allowance started to be paid to unskilled workers at the rate of Rs. 7.50 per month which increased to Rs. 10 per month during last year. Other allowances at the rate of 12½ per cent to the operators started to be paid from 1960.

In Ekra Engineering Works at Bansjora, basic wages increased threefold in between 1947–1959. In this Engineering Works Dearness Allowance is paid at the rate of 151 per cent of basic salary and this rate has not shown any change in between 1947–1959. Other allowances which were paid to the workers were discontinued during the years 1955 and 1956 as cash allowances were consolidated to enhance basic wages but after 1956 such cash allowances continued to be paid at the rate of annas 3 per worker per day.

In ceramic and refractory industry basic wages recorded an increase. In Kumardhubi Refractory and Ceramic Works neither Dearness Allowance nor cash allowances are paid. In firebricks and potteries industry also basic wages have recorded an increase. In Bihar Firebricks and Potteries, Ltd. located in Mugma in Dhanbad district males are paid higher basic wages than the females. In this factory Dearness Allowance to unskilled workers have recorded increase in the years 1949, 1950 and in the year 1958. In Reliance Firebricks and Potteries Co., Ltd., unskilled workers were paid Dearness Allowance at the rate of Rs. 23 per month in 1947 which increased to Rs. 25 per month in 1950 and to Rs. 35 per month in 1959. In this firebricks factory, wages are lower than in other such factories particularly in comparison with the level of wages at Mugma. In Orient Potteries, Ltd., workers are not paid any allowance whatsoever. On the whole basic wages have remained stable in the pottery and firebrick industries presumably due to abundant and cheap supply of labour and due to lack of properly organised bargaining for higher wages. It is also due to the fact that Minimum Wages Act of 1948 does not cover these important industries of Dhanbad where 'sweated' labour is prevalent. In

Shalimar Tar Products, a factory at Jharia, concerned with the manufacture of bye-products of coal, basic wages remained stable up to 1955 but in June basic wages were revised and enhanced as cash attendance allowance which was paid to workers up to May, 1956, was consolidated to enhanced basic wages. The rate of Dearness Allowance has remained stable after 1947. In this tar manufacturing factory the lowest paid workers are paid Dearness Allowance at the rate of 150 per cent whereas those with basic pay in between Rs. 100 and Rs. 300 are paid Dearness Allowance at the rate of 40 per cent per month or a minimum of Rs. 67. Those with a basic pay of Rs. 300 are paid Dearness Allowance at the rate of 35 per cent or a minimum of Rs. 120 per month. In this factory, again, from 1958 onwards workers are being paid a variable extra Dearness Allowance @ Rs. 4.87 per month to workers drawing up to Rs. 300 per month.

In Sindri Cement Works, the only cement producing unit in Dhanbad district, minimum basic wages remained stable in between 1955–1957 but Dearness Allowance which was paid @ Re. 1 per worker per day up to 1956 increased @ Rs. 9.6 with the movement of every four points in the cost of living index with 1944 as base.

In Sindri Superphosphate Factory which employs about 8,000 workers per day, minimum basic wages which was Rs. 1.50 per day in 1953 increased to Rs. 2 per day in 1959. Maximum wages doubled in between 1953–1959.

Data showing the trend of minimum wages of unskilled workers in various factories of this district mentioned above is shown below. The source of such data is the Deputy Commissioner of Labour, Government of Bihar, Patna.

Trend of minimum wages of unskilled workers of various factories in Dhanbad district from 1947 to 1959.

(1) Shalimar Tar Products.

Year.	Basic wages.		
		Minimum.	Maximum.
		Rs.	Rs.
1947	Male	0.50	0.75
	Female	0.31	0.34
1948	Male	0.50	0.75
	Female	0.31	0.34
1949	Male	0.50	0.87
	Female	0.31	0.34
1950	Male	0.50	1.00
	Female	0.31	0.34

Year.	Basic wages.		
	Minimum.		Maximum.
		Rs.	Rs.
1951	Male ..	0.50	1.00
	Female ..	0.31	0.34
1952	Male ..	0.50	1.00
	Female ..	0.31	0.34
1953	Male ..	0.50	1.00
	Female ..	0.31	0.34
1954	Male ..	0.51	1.00
	Female ..	0.31	0.34
1955	Male ..	0.51	1.00
	Female ..	0.31	0.34
1956	Male ..	1.06	1.41
	Female ..	1.06	1.06
1957	Male ..	1.06	1.41
	Female ..	1.06	1.06
1958	Male ..	1.06	1.44
	Female ..	1.06	1.06
1959	Male ..	1.06	1.44
	Female ..	1.06	1.06

Dearness Allowance.

1947 onward.

Basic pay up to Rs. 30 per month—150 per cent.

Basic pay over Rs. 30 up to Rs. 50 per month—100 per cent, minimum Rs. 45.

Basic pay over Rs. 50 up to Rs. 100 per month—66 per cent, minimum Rs. 50.

Basic pay over Rs. 100 up to Rs. 300 per month—40 per cent, minimum Rs. 67.

Basic pay over Rs. 300 per month—35 per cent, minimum Rs. 120.

Other Allowances 1947 to May 1956.

Cash attendance allowance—

		Heavy workers.	Light workers.
Single	0.19 nP.	0.12 nP. per day.	
With one dependant ..	0.28 nP.	0.19 nP. per day.	
With more than one dependant.	0.40 nP.	0.31 nP. per day.	

Free rice $\frac{1}{4}$ sr. per attendance to heavy workers.

Extra allowance of Re. 1 per week to light workers in lieu of free rice.

From June 1956 onward—The above cash attendance allowance, etc., consolidated to enhanced basic wages.

From 1958 to 1959—Variable dearness allowance of Rs. 4.87 per month to workers drawing up to Rs. 300 per month.

(2) Bihar State Superphosphate Factory, Sindri.

Year.	Basic Wages.	
	Minimum.	Maximum.
	Rs.	Rs.
1953	1.50 (per day)	2.75 (per day).
1954	1.50 (per day)	2.75 (per day).
1955	1.50 (per day)	3.00 (per day).
1956	1.50 (per day)	4.00 (per day).
1957	1.50 (per day)	4.50 (per day).
1958	1.50 (per day)	4.50 (per day).
1959	2.00 (per day)	5.50 (per day).

(3) Sindri Cement Works, Sindri.

Year.	Basic wages.		Dearness Allowance.	Other Allowances.
	Minimum.	Maximum.		
1955	Re. 1.00 (per day)	Rs. 1.12 (per day)	Rs. 1.00 (per day) ..	F. G. A.* at Rs. 3 per head (per month).
1956	1.00 (per day)	1.12 (per day)	1.00 (per day) ..	Ditto.
1957	1.00 (per day)	1.50 (per day)	Linked with Jharin cost of living Index no. (base—1944) at 100 to 126 at Rs. 0.6 with the movement of every four points.	This F. G. A. was discontinued after the D. A. was linked with the settlement referred to in the Index col. (ii). As per the same agreement a house rent allowance of Rs. 2 per month was being given to every unhoused worker.

* Foodgrain allowance.

(4) Ekra Engineering Works, P. O. Bansjora, Dhanbad.

Year.	Basic wages.		Dearness Allowance.	Other Allowances.
	Minimum.	Maximum.		
	Rs. a. p.	Rs. a. p.	Per cent.	
1947	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1948	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1949	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1950	0 5 0	0 9 0	150	Re. 0-3-0, Re. 0-4-6 and Re. 0-6-6.
1951	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1952	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1953	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1954	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1955	0 5 0	0 9 0	150	Re. 0-3-6, Re. 0-4-6 and Re. 0-6-6.
1956	0 15 0	1 3 0	150	Stopped.
1957	0 15 0	1 3 0	150	Ditto.
1958	1 1 0	1 5 0	150	Re. 0-3-0.
1959	1 1 0	1 5 0	150	Re. 0-3 0.

(5) Tundoo Lead Smelter.
(Metal Corporation of India, Ltd.).

Year.	Basic wages.		Dearness Allowance.	Other Allowances.
	Minimum.	Maximum.		
	Rs. a. p.	Rs. a. p.		
1947	1 0 0 (per day)	2 0 0 (per day)	Nil	Re. 0-2-0 per attendance.
1948	1 2 0 ditto	2 8 0 ditto	Nil	Ditto.
1949	1 4 0 ditto	2 8 0 ditto	Nil	Ditto.
1950	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1951	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1952	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1953	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1954	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1955	1 8 0 ditto	3 0 0 ditto	Nil	Ditto.
1956	2 0 0 ditto	3 8 0 ditto	Nil	Ditto.
1957	2 0 0 ditto	3 8 0 ditto	Nil	Ditto.
1958	2 0 0 ditto	3 8 0 ditto	Nil	Ditto.
1959	2 0 0 ditto	3 12 0 ditto	Nil	Nil.
1960	Rs. 2.25 ditto	Rs. 5.00	..	Rs. 7.00 per 12½ per cent to operators month. 10 per cent only.
1961	Rs. 2.25	Rs. 5.00	..	Rs. 10.00 per month. Ditto.

Year.	Basic wages.		Dearness Allowance.	Other Allowances.
	Minimum.	Maximum.		
	Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
(1) Nirsa Refractory and Ceramic Works.				
1955	0 14 0	1 12 0	Nil ..	Nil.
1956	0 14 0	1 12 0	" ..	"
1957	1 0 0	2 8 0	" ..	"
1958	1 0 0	2 8 0	" ..	"
1959	1 0 0	2 8 0	" ..	"
1960	1 0 0	2 8 0	" ..	"
(2) Orient Potteries (P.), Ltd.				
1959	Male 1 1 0	1 1 0	Nil ..	Nil.
	Female 0 15 0	0 15 0	" ..	"
1960	Male 1 1 0	1 2 0	" ..	"
	Female 0 15 0	1 0 0	" ..	"
(3) Bharat Firebricks and Potteries Private, Ltd., Jharia.				
1947 to 30-11-1956.	0 13 6	1 1 6	0 4 6	--
1956 to 1959 Information incomplete.				
(4) Bihar Firebricks and Potteries, Ltd., Mugma.				
	(Up to 31st March 1947.)		(From 1st April 1947.)	
1947	Male .. 0 12 0	2 0 0	0 11 3	0 14 0
	Female 0 11 0	2 0 0	0 11 3	0 14 0
1948	Male .. 0 11 0	2 0 0	..	0 14 0
	Female.. 0 11 0	2 0 0	..	0 14 0
1949	Male .. 0 12 0	2 12 0	0 14 0 to 1 5 3	
	Female.. 0 11 0	2 12 0	0 14 0 to 1 5 3	
1950	Male .. 1 0 0	2 14 0	0 15 3 and 1 5 6	
	Female.. 0 13 0	2 14 0	0 15 3 and 1 5 6	
1951	Male .. 1 0 0	3 0 0	0 15 3 and 1 5 6	
	Female.. 0 13 0	3 0 0	0 15 3 and 1 5 6	

Year.	Basic wages.		Dearness Allowance.		Other Allowances.
	Minimum.	Maximum.			
		Rs. a. p.	Rs. a. p.	Rs. a. p.	Rs. a. p.
1952 {	Male ..	1 0 0	3 1 0	0 15 3	and 1 5 6
	Female..	0 13 0	3 1 0	0 15 3	and 1 5 6
1953 {	Male ..	1 0 0	3 3 0	0 15 3	and 1 5 6
	Female..	0 13 0	3 3 0	0 15 3	and 1 5 6
1954 {	Male ..	1 0 0	3 5 0	0 15 3	and 1 5 6
	Female..	0 13 0	3 5 0	0 15 3	and 1 5 6
1955 {	Male ..	1 0 0	3 7 0	0 15 3	and 1 5 6
	Female..	0 13 0	3 7 0	0 15 3	and 1 5 6
1956 {	Male ..	1 0 6	3 9 3	0 15 3	and 1 5 6
	Female..	0 13 6	3 9 3	0 15 3	and 1 5 6
1957 {	Male ..	1 0 6	3 9 3	0 15 3	and 1 5 6
	Female..	0 13 6	3 9 3	0 15 3	and 1 5 6
1958 {	Male Re. 1.03 nP. Rs. 3.84 nP. Re. 1.34 nP. and Re. 1.73 nP. from 1st August 1958.				
	Female Re. 0.84 nP. Rs. 3.84 nP. Re. 1.34 nP. Ditto.				
1959 {	Male Re. 1.03 nP. Rs. 3.84 nP. Re. 1.34 nP. and Re. 1.73 nP.				
	Female Re. 0.84 nP. Rs. 3.84 nP. Re. 1.34 nP. Ditto.				
(5) Reliance Firebricks and Pottery Co., Ltd.					
1947		0 10 0	0 12 0	23 0 0	per month Nil.
1948		0 10 0	0 12 0	23 0 0	per month „
1949		0 10 0	0 12 0	23 0 0	per month „
1950		0 13 0	1 0 0	25 0 0	per month „
1951		0 13 0	1 0 0	25 0 0	per month „
1952		0 13 0	1 0 0	25 0 0	per month „
1953		0 13 0	1 0 0	25 0 0	per month „
1954		0 13 0	1 0 0	25 0 0	per month „
1955		0 13 0	1 0 0	25 0 0	per month „
1956		0 13 0	1 0 0	25 0 0	per month „
1957		0 13 0	1 0 0	25 0 0	per month „
1958		0 13 6	1 0 6	25 0 0	per month „
1959		0 13 6	1 0 6	35 0 0	per month „

LEVEL OF PRICES.

Another indicator of economic trends is the level of prices. Level of prices affects the purchasing power of money and thus affects the economic condition of the people. The level of prices has a bearing both on the real income and the standard of living of the people.

The level of prices particularly that of food articles has increased tremendously during the past decades. The *Manbhum District Gazetteer of 1911* gives the level of prices of rice, wheat, and gram during the first decade of the 20th century. On the average during the first decade of the 20th century, wheat was sold at 10 seers 8 chataks a rupee, rice (common) was sold at 11 seers a rupee and gram was sold at 13 seers a rupee.

The rise in the wholesale prices of rice, wheat and gram for the decade 1941–50 as given in the *District Census Handbook of Dhanbad* published in 1954 is given below:—

Ruling wholesale prices of rice, wheat and gram in Dhanbad.

Year.	Month.	Rice (medium).		Wheat (red).		Gram.	
		Rs. s. p.		Rs. s. p.		Rs. s. p.	
1941	January	..	4 14 6	..	4 0 0	..	4 0 0
	April	..	5 0 0	..	3 8 0	..	3 8 0
	July	..	5 11 0	..	3 14 0	..	3 14 0
	October	..	5 4 0	..	4 2 0	..	4 2 0
	December	..	5 11 0	..	4 6 0	..	4 6 0
1942	January	..	5 3 0	..	4 6 0	..	4 6 0
	April	..	5 10 0	..	4 6 0	..	4 6 0
	July	..	7 4 0	..	5 2 0	..	5 2 0
	October	..	9 8 0	..	7 0 0	..	7 0 0
	December	..	9 4 0	..	7 0 0	..	7 0 0
1943	January	..	9 4 0	..	7 0 0	..	7 0 0
	April	..	11 6 0	..	9 4 0	..	9 4 0
	July	..	22 0 0	..	15 12 0	..	15 12 0
	August	..	25 0 0	..	15 12 0	..	15 12 0
	October	..	20 6 0	19 4 0	16 0 0	..	16 0 0
	December	..	15 0 0	16 0 0	13 0 0	..	13 0 0

Year.	Month.		Rice (medium).	Wheat (red).	Gram.
			Rs. a. p.	Rs. a. p.	Rs. a. p.
1944	January	.. ..	14 0 0	16 0 0	12 8 0
	April	.. ..	15 8 0	16 8 0	11 4 0
	July	.. ..	14 0 0	15 0 0	9 12 0
	October	.. ..	14 0 0	15 0 0	9 0 0
	December	.. ..	13 0 0	13 0 0	8 8 0
1945	January	.. ..	12 0 0	13 0 0	8 8 0
	April	.. ..	12 0 0	13 0 0	8 4 0
	July	.. ..	12 0 0	13 0 0	8 4 0
	October	.. ..	12 0 0	13 0 0	8 4 0
	December	.. ..	14 0 0	14 0 0	11 8 0
1946	January	.. ..	12 0 0	..	10 8 0
	April	.. ..	18 0 0	..	March 20 0 0
	July	.. ..	26 0 0	..	..
	October	.. ..	22 0 0	..	..
	December	.. ..	18 0 0	..	..
1947	January	.. ..	18 0 0	12 8 0	18 0 0
	April	.. ..	18 0 0	13 0 0	10 0 0
	July	.. ..	23 0 0	13 0 0	16 0 0
	October	.. ..	25 0 0	13 0 0	10 8 0
	December	.. ..	23 0 0	13 0 0	18 8 0
1948	January	.. ..	22 0 0	30 0 0	10 8 0
	April	.. ..	21 0 0	26 0 0	17 0 0
	July	.. ..	24 0 0	26 0 0	15 0 0
	October	.. ..	25 0 0	20 0 0	12 0 0
	December	.. ..	19 0 0	28 0 0	15 12 0
1949	January	.. ..	26 0 0	28 0 0	12 0 0
	April	.. ..	24 0 0	30 0 0	13 8 0
	July	.. ..	24 0 0	24 0 0	18 0 0
	October	.. ..	24 0 0	27 0 0	17 0 0
	December	.. ..	22 0 0	20 0 0	19 0 0
1950	January	.. ..	22 0 0	20 0 0	19 0 0
	April	.. ..	22 0 0	23 0 0	18 0 0
	July	.. ..	35 0 0	24 0 0	22 0 0
	October	.. ..	38 0 0	30 0 0	22 0 0
	December	.. ..	30 0 0	29 0 0	20 0 0

From the perusal of these figures it will be seen that prices have increased 5 to 6 fold during the decade 1941-50.

During the 1920's there had not been much fluctuation in the level of prices but from 1929 onward the downward trend in the prices was noticeable. This was presumably the effect of worldwide depression in 1929 which followed the crash of wall street the biggest financial centre of the world. This depressing level of prices continued till 1938-39 when the Second World War broke out. Immediately on the outbreak of the Second World War in September,

1939, the prices of the essential commodities took an upward turn mainly as a result of speculation. With the disappearance of this initial brief spurt the prices again settled down, and in 1940, there was only a 'latent' inflation under which some amount of excess demand was neutralized mostly by gradual dehoarding or decumulation of stocks. Thus inflationary effects were substantially neutralized by the gradual dehoarding policy of the dealers and the wholesalers who had accumulated huge stocks on the eve of the War.

With Japan's entry into the War in December, 1941 the inflationary spiral gained further momentum. It was in 1941-42 that the 'latent' inflation was converted into a real type of inflation, and people felt the impact of the rising trend in prices. The Indian Government on behalf of U. K. made huge purchases of all types of goods in the Indian market. Naturally the availability of goods and services for the civilian consumption was much lesser than before and thus scarcity of consumers' goods accompanied by a terrible food shortage made the situation extremely gloomy. The working class cost of living index for Jharia prepared by the Commissioner of Labour, Government of Bihar with 1914 as base to 100, increased to 150 in 1941-42 and to 226 in 1942-43. Up to 1943, there was an 'open type' inflation as Government did not introduce any anti-inflationary measures for checking the price rise.

It was during the last quarter of 1943, that the Government introduced price control and rationing of food, cloth, sugar and other necessities of life. These measures converted an 'open' inflation into 'suppressed' type inflation and black-marketing unfortunately became rampant. The working class cost of living index rose to 410 in 1943-44 and thereafter started declining during the following two years. The partially suppressed inflation of the war period made a jerky outburst in the immediate post-war period under the impact of pent up demand. The voluntary abstinence of war period ended and people were eager to consume more goods. Thus propensity to consume increased without sizeable increase in the volume of goods supplied because of heavy wartime depreciation of plants, machinery, and labour unrest. The working class cost of living index mentioned before reached 657 in 1950-51 with 1914 as base.

The Korean War (1950) was regarded as a prelude to the Third World War and therefore it greatly increased the propensity for hoarding goods. The level of prices went up and in April, 1951 the level of prices reached its peak. In 1952 the first year of the First Plan, prices declined and ushered in a recession which reached its lowest mark in 1955. During the First Plan period, due to favourable monsoons and other climatic factors agricultural production exceeded the target. As supply outstripped the demand, prices of food articles and other agricultural commodities declined. After 1955, there was a series of crop failures due to irregular monsoon.

Along with that the expenditure on the plans greatly exceeded the available investible resources. Inflationary rise in prices continued. This upward move in prices gathered momentum during the Second Five-Year Plan period. Prices went up unchecked and made deep cuts in the living standards of the people and thus dampened people's enthusiasm for the Five-Year Plans. Deficit financing is a factor that was largely responsible for this untoward rise in prices. Too much money was chasing too few goods. Dhanbad district experienced this pattern more than anywhere. The year 1958 recorded peak rise in prices and to arrest further increase in the level of prices Government started fair price shops once again.

Recently, we have embarked on the Third Five-Year Plan. It is important to remember that on the eve of heavy investment programmes undertaken in this industrial belt of India, absolute constancy in price level cannot be expected. In a developing district like Dhanbad where additional income is being generated by deliberately stepped up investments, prices can be held only by matching additional production to additional income. However, additional production will not take place without incentive of price rises. Thus prices may be allowed to rise slowly and steadily. But in case of goods which fulfil the basic necessities of life, prescription of ceiling and floor prices with a flexible control over production will be very much appreciated.

The trend in the consumers' prices which consist of retail prices may be known from the *Consumers' Price Cost of Living Index Numbers for Jharia* published by the Government of Bihar and by Labour Bureau, Government of India. While Government of Bihar calculates the index with 1939 as base (100), the Labour Bureau, Government of India calculates the same with 1949 as base (100). The index for the years 1951-58 is given below:—

Published by Government of Bihar.			Published by Labour Bureau.		
Period.		Index, Jharia.	Period.		Index, Jharia.
1939	..	100	1949	..	100
1953	..	543	1953	..	166
1954	..	436	1954	..	131
1955	..	409	1955	..	77
1956	..	457	1956	..	87
1957	..	525	1957	..	99
1958	..	574	1958	..	108

The working class cost of living index number compiled by the Commissioner of Labour, Bihar gives the consumers' price of working class with base 5 years ending 1914-100.

The index for Jharia is given below:—

Year.	Index.	Year.	Index.
1914.. ..	100	1945-46	379
1938-39	103	1946-47	406
1939-40	116	1947-48	459
1940-41	126	1948-49	553
1941-42	150	1949-50	568
1942-43	226	1950-51	657
1943-44	410		
1944-45	368		

STANDARD OF LIVING.

The material condition of the people could be gathered from a study of the standard of living of the people. Standard of living, in its turn, is directly allied to the livelihood pattern, the level of income, propensity to consume, consumption pattern, number of dependants and level of prices and the current socio-economic changes. Two persons of somewhat same income and with about equal number of dependants would have different expenditure pattern and different consumption if their livelihood pattern is different. An agriculturist in a rural area and an office-hand in an urban area, would have different standard of living although their income may be of the same groups. It is necessary to consider the standard of living of rural people and urban people separately.

During the past, cadastral surveys were done to appraise the material condition of the people engaged in agriculture. No such survey has been done in recent years and the technique of appraisal has also become different. In 1951 a sample survey of the size of the agricultural holdings was done to ascertain the size of holdings of agriculturists. The result of the survey could be shown in the chart below:—

Distribution of 1,000 Agricultural holdings by size of holdings.

(Based on sample survey of size of holdings, 1951.)

Up to .50 acres.	Exceeding .50 acres and up to 1 acre.	Exceeding 1 acre and up to 2 acres.	Exceeding 2 acres and up to 3 acres.	Exceeding 3 acres and up to 4 acres.	Exceeding 4 acres and up to 5 acres.
1	2	3	4	5	6
423	121	158	84	55	7

Exceeding 5 acres and up to 10 acres.	Exceeding 10 acres and up to 15 acres.	Exceeding 15 acres and up to 30 acres.	Exceeding 30 acres and up to 50 acres.	Exceeding 50 acres.
7	8	9	10	11
86	31	26	Nil	9

From the perusal of the figures, it is apparent that 42 per cent of agricultural holdings in this district are of less than .50 acre ($\frac{1}{2}$ acre) and 70 per cent of agricultural holdings fall below 2 acres. Agricultural holdings with a size of 5 acres or more, constitute only 15 per cent of the total agricultural holdings. This shows that the number of big cultivators in this district is a few only. Most of the cultivators cultivate the same ancestral plot and have a very low level of income. The number of dependants outnumber the number of earning members in the family. The method of cultivation is almost the same as before. The additions to the family ultimately start working in the same ancestral plot with the other members of the family. The family members, who work on the family plot, are all self-employed and it is a very difficult job to disemploy a self-employed worker. The law of diminishing return operates more vigorously because the additional workers are poor substitutes for land and capital. Thus the average output per member of family is alarmingly low not only because of scarcity of land and outmoded technique of cultivation but also due to the fact that there is much of "disguised" or "concealed" unemployment in agriculture. The consequence has been that the material condition of most of these agriculturists is the same as before if not worse. As much as 70 per cent of their income is spent on food items and even then their diet is neither balanced nor sufficient. They live in thatched huts with insanitary condition and most of the families are in debt in one form or other.

Compared to this, the position of big landlords or cultivators is far superior. They live in brick-built or in well-built thatched houses. Their diet is more or less balanced and apart from fulfilment of daily necessities of life, some of them possess luxury goods like radio sets, etc. A big portion of their income goes for the education of their children. These families spend a large portion of their income for the display of their social status.

The material condition of the landless labourers in the villages is deplorable. Agriculture provides them only with seasonal employment during the sowing or harvesting season. During the rest period of the year they search for jobs in urban and non-agricultural occupation. However, compared to the position of landless labourers in other parts of Bihar, the position of such labourers in this district is much superior due to the availability of opportunities of employment during off seasons. Sometimes they take up the job of rickshaw pulling or the job of labourer in construction or other manufacturing industries of this district. The standard of living of the upper class people with higher income, in the urban and non-agricultural areas, is considerably high. Industrialists, business magnets, engineers, mine-managers, advocates, specialised doctors and high-ranking officials in Government, semi-government and other private concerns constitute this class. The standard of living of the middle class people in urban areas, particularly those

living in the vicinity of Dhanbad and Jharia is worse than those in rural areas. Two independent surveys* conducted by private persons have shown that the middle class cost of living in Dhanbad region is higher than that in Calcutta. There is acute dearth of inhabitable rented houses in coalfield and those available are available only on exorbitant rent which is beyond the means of a middle class family. According to the ideal budget theory suggested by Engels, only 10 per cent of our income should go as house rent. But in Dhanbad this percentage is between 16 to 22 for the middle class families. Again, in absence of proper water-supply in most of the places, cost on water mostly drawn by "bhariwallas" from the neighbouring wells is sometimes exorbitant in proportion to the earning of the family. On the average a middle class family has to spend from Rs. 15 to 20 per month for getting water which generally goes up to Rs. 25 per month during summer months.

People in the urban areas of coalfield have to do a lot of travelling everyday because most of them live away from the market, the railway station, the schools, colleges and the hospitals. The cost of transport is high in Dhanbad area. Most of the people in higher income-group own car and as such are not victim of rush and costly transport. Compared to the cost of transport in a metropolitan city like Calcutta, the index of transport cost comes out to be 280 in coalfield (taking Calcutta as 100).

Due to transport cost, education, medical facility and entertainment are very costly. Usually the cost of transport to the cinema house and back is more than the value of the cinema ticket. All other services are relatively costlier in coalfield. The upward movement of the prices of the essential commodities does not show any decline. The cumulative consequence of all this has been that the material condition of the middle class people has deteriorated considerably.

The standard of living of the low income-group people in non-agricultural areas is, again, very low. Industrial workers and mine workers constitute the major portion of this group. The Royal Commission of Labour in India, 1931, *inter alia* reported that among the causes responsible for the low living of the industrial workers, indebtedness occupied a high place. The Commission further stated that in most of the industrial centres, the proportion of the families or individuals who were in debt was not less than two-thirds of the whole. They contended that debt was a principal obstacle to efficiency for the reason that it destroyed the incentive to effort.

The problem amongst the colliery workers is much more serious. A survey conducted under the auspices of the Coal Mines

*" Middle Class cost of living in Dhanbad Area," Eastern Economist, 12th May, 1961, by A. B. Chakravarty.

Labour Welfare Organisation in 1959* into the family budgets of the coal mines workers residing at Bhuli township alone showed that about 50 per cent of the workers' families were in debt. The incidence of debt will no doubt be much higher if a comprehensive survey of all colliery workers in the country is conducted. The average debt per family is estimated at about Rs. 250 which is equivalent to 2½ months' earnings of a worker. The rate of interest on these debts is a matter entirely for the lender to decide and the same is found to vary between the astounding figures of 300 to 600 per cent per annum.

Housing presents an equally acute problem. Another Sample Survey in regard to the housing conditions in the coalfields of Jharia and Raniganj conducted by the organisation brought out the startling data that only 20 per cent of the total workers population were housed and that even out of the 20 per cent as much as 84 per cent lived in one-room tenements. It also spot lighted overcrowding as, on the average, 5.8 persons lived in one-room tenements. The survey also revealed that not only housing accommodation was inadequate, but also that basic requirements like water-supply, drainage, latrines, etc., were not available. Considering the gravity and seriousness of the problem, the Coal Mines Welfare Organisation has, from its very inception, embarked upon a number of schemes beginning from one of constructing its own houses in townships, followed by schemes of granting subsidy to colliery managements and subsidy-cum-loan to encourage them to take up construction of houses in adequate number for their workers. Low-cost housing scheme, envisaging construction of one lakh houses at a cost of Rs. 13 crores (each costing Rs. 1,300) during the Third Plan period has also been introduced recently.

As regards housing scheme for service holders in the town it may be mentioned that they enjoy certain amenities and privileges which are shared by their compatriots in other districts of the State as well. In addition to their basic pay all Government servants are given Dearness Allowance and house rent allowance. Housing is an acute problem in Dhanbad town and the other urban areas of the district, and the vast majority of public employees have to spend a considerable portion of their emoluments on house rent. Considering the difficulty experienced by the public servants in getting suitable residential accommodation at reasonable rates of rent the Government have taken steps either to provide them with living quarters or loans to build their own houses.

The vast majority of the workers in the coal industry of Dhanbad district are unskilled and generally belong to illiterate, ignorant and socially backward classes of the community who often

*SOURCE.—Articles by Brig. K. Bag Singh, Commissioner, Coal Mines Welfare Fund in Republic Day, 1962, number of "Coalfield Times" and "New Sketch", Dhanbad.

migrate to coalfields because of economic pressure. Because of the very nature of their illiteracy and ignorance they are easily susceptible to exploitation and in no time fall a prey into the hands of unsocial elements who, taking advantage of their innocence, rob away a major portion of their hard-earned income by encouraging them to indulge in several kinds of vices, of which drinking and gambling occupy the first place. Such vices lower their moral and economic standard with the result that they are forced to borrow and purchase goods on credit from the avaricious money-lenders and shop-keepers on whatever terms dictated by them.

To bring about changes in socio-economic conditions of colliery workers, the Coal Mines Welfare Organisation has most earnestly addressed itself and amongst its many programmes calculated to promote the welfare of colliery workers including educating them, a vigorous drive to organise a net work of co-operative societies throughout the coalfield has been accorded very high priority. Though the task involved is really stupendous, the necessary foundation in this regard has already been laid firmly and through the organisation's efforts not less than 245 societies have so far been registered and opened at different collieries during the past three years. The societies are provided not only with the necessary technical guidance with regard to their formation and successful management, but are also assisted with non-recurring grants towards preliminary expenses incidental to the formation of such societies. In order to enable the newly organised co-operative societies to pull successfully through the initial period and to stabilise themselves financially, the organisation has also formulated a very generous scheme of advancing loans to the co-operative societies on easy terms, through the Central Co-operative Banks, where such banks are agreeable to do so and otherwise direct to the societies. Under this scheme, a sum of Rs. 50 lakhs is expected to be advanced to the various co-operative societies during the current Five-Year Plan of the organisation for the period 1961-62 to 1965-66.

ARTICLES OF CONSUMPTION AND FAMILY BUDGETS.

Articles of consumption and family budgets are important indicators of economic trends. Since detail and comprehensive survey on the pattern of consumption and family budgets are lacking, it would be hazardous to draw any definite conclusion. Practically there has been no survey on the pattern of family budgets in rural areas. What are taken as social obligations still play a big role in determining family expenditure. Marriage, other ceremonies and funeral expenses, litigation, etc., take away a major portion of family income and most of the cultivators invest very small amount, if at all, for the improvement of agriculture. The margin of saving is negligible in most of the families and in spite of intensive campaign by the Government, there is lack of propensity to save in rural areas. Hence both the ability to save and the will to save are negligible.

A portion of the family expenditure, in most of the families of lower income-group, goes in liquidating the debt and as such very little residue is left for saving. Landless labourers, as mentioned before, have a hand to mouth existence.

In 1943-45, the Labour Bureau of Government of India conducted some family budget enquiries in different industrial centres of India under the Government of India's Cost of Living Index Number Scheme. Due to its industrial importance, Jharia was selected as a centre. Family budget enquiries were conducted by field investigators in strictly randomly selected workers' households. The information collected was about the income of the family, consumption of the family, in terms of quantities, expenditure on various goods and services. To determine weighing diagram, the average budgets showing expenditure on all goods and services consumed by an average family (excluding workers living single) derived from the above enquiries formed the starting point. The following consumption groups were chosen; food; fuel and lighting; clothing, bedding and foot-wear; house-rent and miscellaneous.

In Jharia, workers were living in houses provided free of charge and so house rent was not included in the index. Alcoholic beverages, tobacco and *pan* have been included under miscellaneous group. For assigning weight to individual item within a group, the expenditure on each item was expressed as a percentage of total expenditure of all items in the group. The group weights were in turn derived by expressing the total expenditure on the group, as recorded in the average budget, as a percentage of the total family expenditure in the average budget.

Illustrations of the average monthly expenditure for family as revealed by family budget enquiry will now be given which will show the pattern of expenditure.

Rs. as. pies.

42 11 3 = 100

- (a) Food group—77.7 per cent.
- (b) Fuel and lighting—0.5 per cent.
- (c) Clothing, bedding and foot-wear—6.7 per cent.
- (d) House rent—Nil.
- (e) Miscellaneous—15.0 per cent.

As is evident from expenditure pattern as much as 78 per cent of total expenditure is absorbed in food items; principal items in food are rice, flour, *dal*, vegetables, oil. Expenditure on account of house rent is nil and miscellaneous items constitute as much as 15 per cent of total expenditure. In this miscellaneous group, alcoholic beverages and tobacco constitute main items. Thus a good portion of their hard-earned income goes for drinking, smoking, gambling and servicing of debt.

In the family budget of the middle class families the following appear to be the expenditure groups with weightage:—

- (1) Food—52 per cent.
- (2) House rent—15 per cent.
- (3) Clothing, bedding and foot-wear—10 per cent.
- (4) Transport—3.3 per cent.
- (5) Education—5 per cent.
- (6) Medical facility—3.3 per cent.
- (7) Entertainment—3.3 per cent.
- (8) Fuels, light, etc.—3.3 per cent.
- (9) Services, etc.—4.8 per cent.

100 per cent.

The family budget of a middle class family in Dhanbad where the family consists of husband (1), wife (1), dependant (1), children 3 ($1\frac{1}{2}$) with an average income of Rs. 300 per month was found to consist of the following items of expenditure:—

(1) *Food for a month—*

- (a) Rice 4 chataks per diet unit. Approx. 35 seers; @ Rs. 28 per md.—Rs. 24.50 nP.
- (b) Wheat 4 chataks per diet unit. Approx. 35 seers; @ Rs. 16.50 per md.—Rs. 14.50 nP.
- (c) Pulse @ 1 chatak per diet unit. 15 seers @ Rs. 30 per md.—Rs. 11.25 nP.
- (d) Vegetable for month Rs. 40—Rs. 40.00 nP.
- (e) Mustard oil—4 seers @ Rs. 2.75 per seer—Rs. 11.00 nP.
- (f) Spices—Rs. 3.00.
- (g) Milk—30 seers (1 seer a day) @ Rs. 1 per seer—Rs. 30.00 nP.
- (h) Sugar—5 seers @ Rs. 1-2-0 per seer—Rs. 5.50 nP.
- (i) Fish or meat—twice a week—Rs. 12.00 nP.
- (j) Tea—1½ lbs. approximately—Rs. 5.00 nP.

(2) *Fuel—*

- (a) Coal—3 mds. @ Rs. 1.75 per md. and casting—Rs. 6.00 nP.
- (b) Kerosene oil or electricity—Rs. 4.00 nP.
- (3) Clothes, beddings and foot-wear, etc. (average) monthly estimate—Rs. 30.00 nP.
- (4) Medical expenses (average)—Rs. 10.00 nP,
- (5) Education (average)—Rs. 15.00 nP,

- (6) Transport (average monthly)—Rs. 10.00 nP.
 - (7) Entertainment (including festivals and journey to home once a year)—Rs. 10.00 nP.
 - (8) House rent (average)—Rs. 45.00 nP.
 - (9) Miscellaneous including services—Rs. 13.25 nP.
- Total—Rs. 300.00 nP.

LEVEL OF EMPLOYMENT.

Sources of labour supply.

According to 1951 Census, the main source of labour supply was Purulia and Dhanbad districts. Hazaribagh, Shahabad, Bhagalpur and Saharsa districts of the State came next as important source of labour supply. The coal industry, however, has also been attracting immigration from all parts of the country. Gorakhpur labour for the coalmining industry, under the Gorakhpur Labour Organisation Scheme, is a regular source of immigration. In other industries also, particularly in major industries like Sindri Fertilizer, workers are drawn from all parts of the country. Thus, immigration forms an important feature of the employment market conditions of this district. The rapid industrial expansion of coal industry started in this area during the last decade of the 19th century and since then, there has been large-scale immigration from the west attracted by the development of mining industry. This has led to a big rise in population of this district. According to the *District Census Handbook*, this district (then a sub-district) had a population of 7.32 lakhs in 1951 and of this only 70.1 per cent had their birth places within the district; 20 per cent had their birth places in other districts of the State; 7.3 per cent were from other States and the balance were foreigners.

Levels of employment may be studied under two broad groups—level of employment in agriculture and level of employment in non-agricultural occupations.

LEVEL OF EMPLOYMENT IN NON-AGRICULTURAL OCCUPATIONS.

The number of self-supporting persons who derived their livelihood from non-agricultural occupations on the basis of revised boundaries of Dhanbad district at the time of 1951 Census has been estimated to be 1,88,843. Out of this, 1,27,640 persons were engaged in production other than cultivation, 18,137 persons were engaged in commerce, 10,141 persons in transport and 32,925 persons in other services and miscellaneous occupations. Thus about 20 per cent of the total population of this district were employed in the non-agricultural occupations.*

* At present (1960) the estimated level of employment in non-agricultural occupations would be near about 2,50,000.

In the Census Report, however, details regarding the level of employment in non-agricultural occupations are available for the sub-district only. According to the *Census of India, 1951*, Volume V, Part II B, the level of employment in different non-agricultural occupations in the sub-district of Dhanbad would be as follows:—

EMPLOYMENT BY CLASSIFICATION IN DHANBAD (SUB-DISTRICT)
IN 1951.

Nature of employment.	Level of employment.	
<i>Industry and services (total)</i>	1,81,963	
(1) Primary Industries ..	1,008	(0.5 per cent)
(a) Animal Industry—186		
(b) Plantations—Nil		
(c) Forest and woodcutting—142		
(d) Fishery and hunting—680		
(2) Mining and quarrying ..	1,14,471	(62.9 per cent)
(a) Coal mining—1,14,471		
(b) Iron mining—Nil.		
(c) Metal mining—Nil.		
(d) Mica mining Nil.		
(3) Agricultural products ..	1,375	
(a) Grains and pulses—70		
(b) Sugar and beverages—1		
(c) Tobacco—1,160		
(d) Others—144		
(4) Commerce ..	17,150	(9.1 per cent)
(a) Wholesale trade—156	} Rural ..	7,101
(b) Retail trade—16,762		
(c) Real Estate, Insurance and Banking—232		
Urban ..		10,049
(5) Transport ..	10,516	(5.8 per cent)
(6) Health, Education and Public Administration.	5,502	(3.2 per cent)
(7) Domestic services ..	1,785	} (10.8 per cent)
(8) Personnel services ..	1,303	
(9) Hotels restaurants and eating houses.	660	
(10) Legal and business services.	2,169	
(11) Art, journalism, religion and welfare services.	277	
(12) Recreation and unclassified services.	13,475	

Nature of employment.	Level of employment.
(13) Manufacturing industries ..	8,993
(a) Textile industry—1,526	
(b) Leather industry—1,016	
(c) Ferrous and non-ferrous metals and machinery—3,058	
(d) Chemicals and chemical products—70	
(e) Non-metal industries—1,005	
(f) Other industries—834	
(g) Wood and paper products—1,484	
(14) Construction utilities and maintenance.	3,249 (1.8 per cent)

These figures could be accepted as approximately accurate. The statistics indicate that the employment in coal mining and quarrying forms the bulk of employment in non-agricultural sector in Dhanbad district, that it comes to 62.9 per cent of total non-agricultural employment. Services accounted for 10.8 per cent and trade and commerce accounted for 9.4 per cent of total non-agricultural employment.

Level of Employment in coal-mining industry.

At present there are about 426 working mines in Dhanbad district employing about 1,31,156 persons. Females are not allowed to work underground and they work in opencast workings or on the surface and they constitute about 14 per cent of total employment in coal-mining industry in this district. Employment in coal-mining industry of this district during the past 12 years had been of the following order as given in the Annual Report of the Chief Inspector of Mines for last twelve years* :—

Year.	Level of employment.
1950	1,50,867
1951	1,50,147
1952	1,45,612
1953	1,40,480
1954	1,38,338
1955	1,38,304
1956	1,38,212
1957	1,37,541
1958	1,39,979
1959	1,38,776
1960	1,39,716
1961 (July)	1,31,156

* Source.—“ Coal Bulletin ” July, 1961 issued by the Chief Inspector of Mines, Dhanbad.

These figures indicate that in recent years, the level of employment in coal industry has considerably decreased in comparison to the level of employment in 1950. This marked fall in the level of employment in coal-mining industry may be due to the restriction of opening of new mines under private sector. It may also be due to more of mechanisation of mines which makes the industry capital-intensive and eliminates labour-intensive methods of production.

Contract Labour.

Labour employed consists of both direct labour and contract labour. Employment of contract labour, i.e., labour employed indirectly through the contractors, appears to be widespread in the collieries for raising coal, removal of overburden, coking, etc.; and in the construction establishments on earthwork, brick-making, etc. The following figures show the volume of direct and contract labour employed in coal-mining industry of Dhanbad during the years 1957-60:—

Year.		Direct labour.	Contract labour.
1957	..	1,26,303	11,138
1958	..	1,26,888	13,091
1959	..	1,26,047	12,729
1960	..	1,24,555	15,161

SOURCE.—Annual reports of the Chief Inspector of Mines.

The figures indicate that the level of employment of direct labour is more or less stable but that of the contract labour is fluctuating depending on the demand for contract labour.

Next to coal-mining industry, ceramic and refractories occupy a paramount position. In 1959 Dhanbad had 19 units of this industry operating, employing about 7,636 persons. With growing industrialization, accelerated electrification programmes and increasing urbanization the demand for ceramics and refractories is bound to rise. It may reasonably be expected that with the expansion of this industry, the level of employment in this industry would go up.

Fertiliser Industry.

The plant at Sindri is a major producer of nitrogenous fertiliser. Its output in 1956-57 was 3,33,705 tons (ammonium sulphate) valued at about Rs. 8 crores. The employment in Sindri Fertilizers increased from 5,500 in 1953 to 8,000 in 1956. At present it employs about 7,500 persons.

Bricks and Tiles.

During 1956, there were nine units of this industry employing about 6,351 persons. The future of this industry is bright because with development of rural housing demand for bricks and tiles is

bound to be increasing more. This is a labour-intensive industry and offers good opportunity for relief of unemployment and under-employment in rural areas.

Radio and Radiograms, etc.

The only unit of the State situated at Nirsachatti, was set up in 1946. It manufactures radio parts and assembles radios and radiograms. The unit is also manufacturing some electrical accessories. The level of employment increased from 62 in 1953 to 200 in 1956 and to 467 in 1959.

The cement factory at Sindri employs about 309 persons per day.

Stone-dressing and cutting industry had four units in 1956 employing 102 workers per day.

Lead industry.

The Metal Corporation of India, Ltd. at Katrasgarh, the only unit of the State, is engaged in smelting and refining of lead and employs about 480 persons per day.

Tar industry.

Tar is one of the major by-products of coal. There are five units in this district which are engaged in the production of tar, and employs about 733 workers per day.

Miscellaneous.

In Electricity generation 589 workers are employed in this district. There are nine electricity generating units of which Sijua Electricity Supply Co., Ltd., Loyabad employs about 420 workers per day.

In chemical industries level of employment has gone up considerably. In 1951 this industry engaged only 70 workers whereas at present it engages more than 600 workers per day. Loyabad Coking and By-Products Recovery Plant, Bansjora, which is a sulphuric acid manufacturing plant employs 507 persons. Bihar State Superphosphate Factory at Sindri employs 100 persons per day and is engaged in the production of sulphuric acid and superphosphate.

Apart from these, there are ferrous and non-ferrous foundries, engineering and repairing works, employing about 4,500 persons. Kumardhubi Engineering Works at Kumardhubi has a force of employing about 1,812 persons. Eagle Rolling Mills (P), Ltd. at Kumardhubi employs about 500 persons. There are four repairing works of Damodar Valley Corporation at Panchet which employ 819 persons. These repairing works include maintenance and repairing of motor vehicles. There is one factory at Panchet which produces industrial fasteners (i.e., bolts and nuts) and engages 100 workers per day.

At Maithan, the Regular Repair Shop (fabrication) employs 449 persons. Another workshop at Maithan employs 96 workers per day. Repairing works of colliery machines and automobiles of coalfields also account for a large number of employment.*

The construction industry is more in the private sector and there are about 53 establishments, employing as many as 3,360 persons (1958 December). In recent years, the tempo of construction activities has been on the increase and the level of employment in construction industry must have gone up very considerably.

Trade and commerce.

According to the Census Report of 1951, the sub-district of Dhanbad had 17,150 persons employed in trade and commerce. This comes to 9.4 per cent of total employment in non-agricultural occupations. According to revised estimates the reorganised district of Dhanbad had 18,137 persons engaged in commerce in 1951. In Real Estate, Insurance and Banking 232 persons were employed. Since 1951 the level of employment in trade and commerce has tremendously increased. The Shop and Municipal Act has been enforced in the municipal areas of Dhanbad and Sindri and in the areas under Jharia Mines Board of Health. According to present information available from the Registers maintained by the Inspecting Officers under the Bihar Shops and Establishment Act of 1953, there was in December, 1958, 5,694 shops with nil employee in which one or more members of the family of owners themselves were working, 3,347 shops with a licence to employ up to two persons; 676 shops with a licence to employ between three to five persons and 166 shops with a licence to employ six to ten persons. In establishments in first category at least two members of the family would be working. It may be that in some cases the other member might be working only part-time. Assuming this, it would be reasonable to estimate $1\frac{1}{2}$ persons for each shop on the average which would mean self-employment of 8,541 persons. The number of shops with other employment capacities comes out to be 4,189 with an average employment of 11,568 persons. Thus in urban areas 20,109 persons are engaged in commerce. So far we have not considered rural areas where according to 1951 (sub-district figures) census 7,101 persons were employed. The recent data for level of the employment in rural trade and commerce for the reorganised Dhanbad is, however, not available.

Level of Employment in Transport and Communication.

The effective licences for trucks were 564 during December, 1958. Assuming an average employment of two persons on each truck, the estimated number of persons working on these trucks would be 1,128. During December, 1958, 350 cycle-rickshaws, 184 licenced taxis, one

* Source.—(1) List of Registered Factories (under the Factories Act, 1948) in the State of Bihar.

(2) *Techno-Economic Survey of Bihar*, Vol. I.

auto-rickshaw, 141 bullock-carts were reported to be operating for hire in the municipal areas of this district. Assuming an average employment of two persons on each taxi and on each cycle rickshaw and bullock-cart, the total number of self-employed persons would be 1,210. During December, 1958, 65 buses were operating, which employed 229 persons. Detailed statistics regarding employment in storage and communication is not available. According to (sub-district) 1951 Census 10,516 persons were engaged in transport, storage and communication. According to revised estimates for reorganised Dhanbad, 10,141 persons were so employed. This figure also appears to be an under-estimate as there has been an enormous expansion of this line of institution.

Level of Employment in Agriculture.

So long we have not considered the level of employment in agriculture. In agriculture there are 1,75,411 self-supporting persons of which 1,830 persons are non-cultivating owners of land or agricultural rent-receivers. Under-employment, which is a characteristic feature of Indian agriculture, is also prevalent in this district but compared to other regions of the State, it is considerably lower as opportunities of fruitful employment in non-agricultural activities are widely available. Prior to the development of coal mining and other industries, agriculture was the main source of livelihood and under-employment might have been a feature of agriculture in this district. But now, that a large percentage of population has shifted from agriculture to industry, under-employment in agriculture has considerably decreased. At present the ratio of relative level of employment in agriculture and industry is 5 : 5. Details of statistics, however, regarding this shift of population from agriculture to industry and from one industry to another are not available.

On the whole the level of employment in this district has shown spectacularly marked upward trend during the six decades of the 20th century.

UNEMPLOYMENT TRENDS AND EMPLOYMENT EXCHANGES.*

Persons seeking work.

There is no quantitative information available so far from any source about the total number of persons unemployed in the Dhanbad Employment Market area. The only figures on the subject are those available from the three Employment Exchanges (Dhanbad, Sindri and Kumardhubi) in the area, which indicate the number of persons registered for employment assistance as unemployed. The limitation of Employment Exchanges statistics is fairly well-known. Registration at an Employment Exchange is not compulsory for the unemployed and the registrants with the Employment Exchanges

* SOURCE.—Basic Report on Dhanbad Employment Market (for the quarter ending December, 1958), Series 'B', Report, 1st December 1959.

also include some employed persons who conceal the fact of their present employment, at the time of registration with the employment Exchange. Besides, the statistics of Employment Exchanges are generally considered to be indicative of urban unemployment mainly confined to non-agricultural sector. However, the figures of Employment Exchanges in spite of these limitations, are indications of the unemployment trends in the non-agricultural sector, as there is increasing consciousness among the unemployed for utilising the services of the Employment Exchanges.

REGISTRATION AT THE EMPLOYMENT EXCHANGES.

As many as 4,201 applicants (including 361 women) were registered at the three Employment Exchanges of the area during the quarter ended 31st December, 1958, as against 5,076 registrations in the preceding quarter. The comparatively larger number of registrations in the previous quarter was due to the fact that a larger number of persons registered at the Employment Exchanges during the quarter July–September after the announcement of the University results. The industrial origin of the registrants at the Employment Exchanges in the Dhanbad Employment Market area show that as many as 57.2 per cent of the applicants who registered themselves with the Employment Exchanges were either new entrants to the Employment Market or were formerly engaged in agricultural occupations, indicating thereby the magnitude of the problem of creating additional opportunities in the non-agricultural sector. Persons formerly engaged in manufacturing accounted for 18.2 per cent. Most of the persons (nearly 97 per cent) registered with previous employment in manufacturing industries, were formerly engaged with the Sindri Fertilizers for casual jobs. It is also interesting to note that, of the exchange registrants, only two persons (less than 0.1 per cent of the total) had previous employment in trade and commerce which indicates that there is not much displacement of workers in trade and commerce. Another probable inference may be that those displaced from trade and commerce do not normally register themselves with the Employment Exchanges for employment assistance:—

Occupational group.	Number of persons on the Live Register.			Percentage.
	Male.	Female.	Total.	
Professional, Technical and related workers other than Medical and Health and Teaching.	143	20	163	2.2
Medical and Health personnel ..	56	33	89	1.2
Teaching personnel	15	3	18	0.2

Occupational group.	Number of persons on the Live Register.			Percentage.
	Male.	Female.	Total.	
Administrative, Executive and Managerial personnel.	20	..	20	0.3
Clerical workers	993	13	1,006	13.5
Farmers, Fishermen and related workers	11	..	11	0.1
Miners and quarry-men	25	..	25	0.3
Workers in Transport and Communication occupations.	61	..	61	0.8
Craftsmen and production process workers.	644	..	644	8.6
Service, sport and recreation workers ..	25	55	80	1.1
Unskilled (office) workers	1,139	..	1,139	15.3
Other unskilled workers (including sweepers.).	3,782	430	4,212	56.4
Total ..	6,914	554	7,468	100.0

This shows that the largest number of candidates on the Live Registers was of unskilled workers (71.7 per cent). This is because a large number of new entrants including those migrating from agricultural areas, seek employment with the Sindri Fertilizers and other major manufacturing concerns of the area. Clerical workers indicating the demand for white-collar jobs also formed 13.5 per cent of the total. There were only 25 miners and quarry-men on the Live Registers of the exchanges. Apparently miners do not care to register with the Employment Exchanges.

Age analysis of applicants on the Live Registers of the Employment Exchanges.—An age analysis of the 7,468 applicants on the Live Registers of the Employment Exchanges in the area on 31st December is given below:—

Age analysis of applicants on Live Registers of the Employment Exchanges in the Dhanbad Employment Market area.

Age group.	Number of persons.	Percentage.
Below 18 years	204	2.7
Above 18 years but below 22 years	2,298	30.8
Above 22 years but below 25 years	2,711	36.3
Above 25 years but below 35 years	1,641	22.0
Above 35 years but below 45 years	428	5.7
Above 45 years	186	2.5
Total ..	7,468	100.0

The table will show that as many as 69.8 per cent of the applicants on the Live Registers of the Employment Exchanges in the Dhanbad Employment Market area were within 25 years of age. Persons in the age-group 25—35 years accounted for 22 per cent.

Educated unemployed.—Of the 7,468 applicants on the Live Registers of the Employment Exchanges in the area, at the end of December, 1958 as many as 1,100 (including 21 women), i.e., 14.7 per cent were Matriculates and above. Similarly, out of a total registration of 4,201 during the quarter ending December, 1958 as many as 575 persons, i.e., 13.7 per cent of the total were Matriculates and above. The figures separately for Matriculates, I.As., I.Coms., I.Sc., and Graduates on the Live Registers of the Employment Exchanges are given in Table below:—

Analysis by broad qualifications of educated unemployed on the Live Registers of the Employment Exchanges at the end of December, 1958.

Qualification.	Number on the Live Register.			Percentage.
	Male.	Female.	Total.	
Passed Matriculation but not passed Intermediate.	921	20	941	85.6
Passed I. A./I. Sc./I Com. but not completed a degree course.	72	..	72	6.5
Graduates with one or more degree ..	86	1	87	7.9
Total ..	1,079	21	1,100	100.0

The table will show that amongst the educated unemployed, the largest percentage was that of Matriculates who formed 85.6 per cent of the total.

Unemployment of women.—Out of a total of 4,201 applicants registered with Employment Exchanges in the Dhanbad Employment Market area during the quarter October—December, 1958, as many as 361 (8.6 per cent) were women applicants. Of these 361 women applicants, 60.8 per cent were formerly engaged in manufacturing and construction, mostly in unskilled work, and 36.1 per cent were partly new entrants to the labour market and partly those formerly engaged in agriculture. Similarly, out of a total of 7,468 applicants on the Live Registers of the Employment Exchanges in the area at the end of December, 1958 as many as 554 were women applicants representing 7.4 per cent of the total. Amongst those on the Live Registers, the largest percentage (79.4 per cent) were registered for unskilled manual jobs. Except for unskilled manual jobs, medical

and health occupations and service occupations, women applicants represented an insignificant proportion of the total number of employment seekers in different occupations. Except in the occupations listed above, women workers do not seem to play any important role in the Dhanbad Employment Market area.

Workers in short supply.—Information about the types of workers in short supply is available from the Employment Exchanges. Further information on this subject has also been gathered from the returns under the Employment Market Information Programme in which employers were requested to indicate the types of vacancies for which they have been either currently or continually experiencing difficulty in obtaining suitable persons. From the materials gathered, workers in following occupations appeared to be in short supply:—

- (1) Engineering occupations—Professors for Civil, Mechanical and Electrical Engineering, Surveyors (Civil), Turners, and Machinists.
- (2) Mining occupations—Professors for Mining, Colliery Managers, Surveyors (Mining) Overmen, Mining Sirdar and Shot firers.
- (3) Medical occupations—Lady Health Visitors, Nurses and Midwives.
- (4) Technical occupations—Trained Science Teachers and Trained Teachers (High School).
- (5) Clerical occupations—Stenographers and experienced Accounts Clerks.
- (6) Other occupations—Lady Social Education Organisers and *Gram Sevikas*.

COMMUNITY DEVELOPMENT.

To establish a progressive system of agriculture in a land of impoverished soil, the work on Community Development Projects was started after the independence of the country. The Community Development Projects try to give effect to an intensive and comprehensive programme covering all aspects of rural life, e.g., agriculture, rural industries, education, housing, health, recreation, etc., and aim at utilising, under a democratic set-up, the surplus labour force in the rural areas for developmental purposes.

As in many other districts of Bihar, the work on Community Development Projects had started by the end of the year 1954, when the first Block at Topchanchi was inaugurated under the project. Dhanbad was not a district at that time and so the work on other Blocks under this project was started after the sub-district was raised to the status of a district in 1956. Consequently the work on other Block, i.e., Chandankiary, Chas, Gobindpur, Tundi and Nirsa, was started, one by one, from 1956.

Though the work started late on the project as compared to other parts of the State and the country, some achievements have been noticed in the field of rural welfare. It is true that too much emphasis on welfare activities has led to lesser attention on agro-economic activities, but at the same time, the welfare activities undertaken so far have produced some effect on the rural consciousness of economic and to a smaller extent of social needs. There has been some progress in the field of rural education. New schools have started working in rural areas, and for the education of the backward or aboriginals, schools and hostels have been constructed.

In the field of health and sanitation, a few rural hospitals at Topchanchi, Gobindpur, Nirsa, Tundi, Chas and Chandankiary have been upgraded to the status of Government hospitals and in each one Assistant Surgeon, Trained Nurses and *Dais* and compounders have been provided. Family planning clinics have been established in rural areas to aid and advise rural people in matters of family planning. For improved sanitation, wells have been constructed in villages under each Block for the supply of drinking water to the people. Steps have been intensified for preventing and curing leprosy.

The authorities have been trying to infuse the spirit of co-operation amongst rural people. But due to passivity of the people, the progress in the field of co-operatives has been very slow.

Development in the field of agriculture has not been remarkable during the early years of the programme but recently efforts are being intensified for increasing agricultural output. The Village Level Workers—the key extension agents—have been recently directed to devote most of their time to agriculture. The objective under agricultural programme is to raise the crop yields per acre through the greater utilization of irrigation facilities, fertilisers, improved seeds and new techniques and to make the farmer productivity conscious. In the field of irrigation 31 medium irrigation schemes were targeted of which 16 were completed up to 1959 at the cost of Rs. 1 lakh 80 thousand and the remaining schemes are being undertaken; some 731 wells were constructed on which Rs. 1,59,014 was spent, 5 small-scale irrigation schemes were completed; 13 *rehat* pumps and 35 engine pumping sets were distributed. Thus attempts are being undertaken to irrigate the rugged and undulating surface of Dhanbad region. For the distribution of improved seeds, 10 seed-multiplication farms were started on which Rs. 1,55,077 was spent up to 1959. Improved seeds were distributed. To supply the farmers with manure, green manure, compost, superphosphate, and nitrogenous fertilisers were distributed in sufficient quantity. Attempts were made to raise the production of vegetables and to introduce new techniques of production in agriculture. 2,391 implements of new technique were distributed among the farmers. Attempts were also undertaken to impart training to agriculturists and one Agricultural Training School was opened at Dhanbad.

An attempt was made to appraise the working of the projects and the main difficulties were found to be as follows:—

- (1) The apathy of the people and passivity of popular mind have hindered progress in the initial stages of programme.
- (2) The assistance given by the *panchayats* and *ad hoc* popular organisations specially set up for this purpose has been inadequate.
- (3) Lack of proper planning has to a considerable extent been responsible for slow progress.
- (4) The shortage of trained personnel and staff was to a considerable extent responsible for the slow progress and for various mistakes which were made.

Out of a total of 575 Blocks to be opened within the entire State of Bihar, 10 are to be located in Dhanbad district. Up-till now seven Extension Blocks have been opened and two pre-Extension Blocks have recently come into existence. One Block—the last one to be opened in Dhanbad district is to be located in Jharia during the year 1963-64. When all the Blocks come into existence, the Community Development Projects would cover an area of 1,111 square miles and shall include 1,363 villages.

Following are details regarding the achievements of Community Development Project in Dhanbad:—

Name of the Blocks.		When opened.	Number of villages.	Area in square miles.
<i>I. Details of Blocks already in existence.</i>				
1. Govindpur	..	.. October, 1956	.. 241	112
2. Tundi	..	.. October, 1957	.. 258	152
3. Nirsa-Chirkunda	..	.. April, 1958 ..	.. 140	173
4. Topchanchi	..	.. December, 1954	.. 111	71
5. Chas	..	.. June, 1956	.. 148	178
6. Chandankiary	..	.. April, 1956-57	.. 130	144
7. Balliapur	..	.. April, 1961 ..	..	46
<i>II. Details of New Blocks.</i>				
1. Baghmara	..	.. 1962-63 ..	.. 207	102
2. Dhanbad	..	.. 1962-63 ..	.. 76	82
3. Jharia	..	.. 1963-64 ..	.. 52	51
Total			.. 1,363	1,111

SOURCE.—" Dhanbad, 1961 ", Public Relations Department, Dhanbad.

Details of information regarding the achievements of Community Development Project and N.E.S. Blocks for the last 10 years.

	Top- chanchi.	Tundi.	Balia- pur.	Govind- pur.	Chir- kunda.	Chas.	Chan- dan- kiari.
1	2	3	4	5	6	7	8
1. Distribution of Improved seeds (in mds.).	410	726	190	3,035	1,488	1,823	205
2. Distribution of chemical fertilisers (in mds.).	913	1,455	133	1,004	122	836	1,931
3. Number of compost pits ..	2,884	4,494	1,750	3,257	3,541	4,517	7,772
4. Use of green manure (area of total fields in acres).	6,315	1,102	222	3,213	1,527	1,651	2,659
5. Cultivation in Japanese method (area of total fields in acres.)	11,891	5,295	751	1,612	4,216	419	5,341
6. Number of <i>Gram Sewak</i> ..	1,329	5,003	154	1,947	100	557	2,779
7. Cultivation of fallow lands (in acres.).	310	..	14	22	..	702	385
8. New afforestation (area in acres).	694	..	19,500	..	..	2,500	..
9. New <i>pucca</i> wells constructed (numbers).	200	8	33	84	..	105	72
10. New <i>kachcha</i> wells constructed (numbers).	181	..	65	..	..	205	469
11. Medium Scale Irrigation Scheme completed (numbers).	35	..	..	10	53	..	..
12. Small-Scale Irrigation Scheme completed (numbers).	57	..	13	27	9	..	31
13. Number of newly opened schools.	28	6	16	15	90	42	27
14. Area of land received from people for schools (in acres).	58	201	20	66	11	183	310
15. Number of Co-operative Societies.	21	36	2	33	35	32	110
16. Number of developmental works undertaken by <i>Gram Panchayats</i> .	83	286	10	707	251	1,935	177

SOURCE.—“Dhanbad, 1961”, Public Relations Department, Dhanbad.

Expenditure of C. D. Programme in Dhanbad district.

Item.	Systematic ceiling.	Expenditure up to 1958-59.	Allotment during the year 1959-60 up to 31st December, 1959.
	Rs.	Rs.	Rs.
1. Block Project Headquarters ..	16,60,000	3,52,276	5,14,207
2. Animal Husbandry and Agriculture	3,00,000	39,630	52,660
3. Irrigation and Reclamation ..	17,85,000	3,78,260	4,39,609
4. Health and Rural Sanitation ..	3,25,000	77,975	1,18,476
5. Education	3,50,000	27,220	54,000
6. Social Education	4,20,000	58,819	54,763
7. Communication	4,75,000	12,809	34,900
8. Rural Arts and Crafts and Industries	3,75,000	1,211	42,584
9. Housing	5,30,000	2,24,169	2,64,734

SOURCE.—Dhanbad "Past and Present", Public Relations Department, Dhanbad.

THE ROLE OF DHANBAD IN IMPLEMENTING GOVERNMENT POLICIES RELATED TO DEVELOPMENT AND PLANNING.

Dhanbad is a newly created district, inaugurated as late as 26th October 1956. In fact the upgrading of the status from that of a sub-district covering 1,625 villages with a population over 9 lakhs indicates the special attention of the Government. The area has an extraordinary claim to importance because of its richness in coal deposits as well as its soil condition which is as conducive to the production of paddy, as the industries of ceramic and refractories and installation of many other industries. A brief assessment of its development on various lines may be outlined.

Industries.

As mentioned before Dhanbad is pre-eminently important for its coal industry. It possesses the best and the highest coal deposits in its main coal belt of Jharia which alone contributes more than 50 per cent of the Indian coal. It covers an area of about 175 square miles,

having an estimated reserve of 5,000 million tons. About 25 million tons of coal is its annual output and more than 2 lacs of people are engaged in it directly or indirectly. Besides the important coal mines at Lodna, Tata, Sijua, Loyabad and many other centres, different industries are there at Loyabad, Bansjora, Bamee, etc., for the production of coke and bye-products of coke, e.g., coaltar, road-tar, pitch, phenyl, sulphate of ammonia, sulphuric acid, naphthalene, grease oil and many other chemicals. Improvements are sought for, tried and implemented in the working of these industries and the coal washery plant at Jamadoba and at Dugda has been virtually much improved.

Dhanbad is much more than a mere coal centre. The rich mineral has helped a lot of other industries to build up. Kumardhubi Engineering Works is a big concern and there are many other important ones like Mcamco at Kusunda, Turner Nagar, Ekra, Nirsra, etc. The Metal Corporation of India at Tundoo near Katras, the only factory of its kind in Bihar produces lead and silver. The Glass Factory at Chota Ambona is also famous. Besides these, there are several factories of refractories and ceramic products at Kumardhubi, Chanch, Jharia, Mugma, etc., and other such factories are likely to come up soon at Kumarjuri at Katras. Licences are being issued by the Government authorities for the expansion of these industries under the Five-Year Plans.

The existence of Sindri itself stands as a landmark in the agro-industrial development of the district. The fertiliser producing organisation engages itself not only in an attempted production of 400 tons of double salts and 70 tons of uria per day, but has also installed a big coke plant to derive benefits from the bye-products of coal industry. The State Government of Bihar has further established a Superphosphate Factory there, which has gone in production since 1958. The Associated Cement Factory at Sindri has also expanded accordingly.

As is evident, Dhanbad has been playing a vital role in the industrial development of the country during the 1st and 2nd Five-Year Plans, and it is needless to speak of its role during the Third Five-Year Plan when the region is expected to be in the throes of dynamic expansion and development. During the Third Five-Year Plan, as everybody knows, the Fourth Steel Plant under public sector is being located at Marafari near Chas police-station at Dhanbad, with its headquarters at Dhanbad, the hub-bub of Bihar coalfields.

Power Resources.

The fact that a district with 2 per cent of total population of Bihar is responsible for 65 per cent of total consumption of electricity, is a significant pointer of the role of this district in the utilization of power for the basic industries like coal and cement and for

many other industries which are of national importance. Development of electricity been rapid and the main sources of supply are Damodar Valley Corporation with its power houses at Maithon, Panchet, Sijua and Jharia Electricity Supply Company at Bansjora. One Thermal Power Plant at Dugda is also likely to be completed during the Third Plan period. The district has, thus, been keeping in tune with the national policies for utilising power for economic development.

Agriculture and Animal Husbandry.

Side by side of industrial development, attempts are sought for, tried and implemented in the development of agricultural base of this district. Improved methods of cultivation have been gaining ground amongst the cultivators in the villages. Irrigation, distribution of improved seeds and fertilisers and of new implements have aroused consciousness among the rural people for the betterment of agriculture. In matters of Animal Husbandry, the developments have been marked and the district has been assigned the status at par with other districts of the State. Class I Veterinary Hospital has been constructed at Topchanchi and Field Veterinary Dispensaries are under construction. Poultry Houses, Artificial Insemination Centres, Block Fodder Nurseries, etc., have also been constructed.

Co-operatives.

The role played by the district in the field of co-operatives has been of less significance for the fact that the movement has not taken root in the life of the people, though it is gaining popularity day by day. District Co-operative Department headed by an Assistant Registrar of Co-operatives, is trying its best to implement various schemes of co-operative which may help in improving the economic conditions of the people.

Education.

In the field of education this district has been playing a very crucial role in implementing the policy of the Government while the spread of general education in this district has started laying foundation for changes in social behaviour. Tremendous progress in the field of technical education has been providing the country with trained personnel who are as important for economic growth as capital formation itself. Indian School of Mines, the only institution of its kind, has been a source of regular supply of trained mine-managers' in coal and other important mines of the country. Bihar Institute of Technology at Sindri has been supplying the nation with Engineers in Mechanical, Electrical, Metallurgical and Chemical Engineering. The existence of two National Research laboratories—Fuel Research Institute and Central Mining Research Station—points out the extraordinary importance of this place in the provincial as

well as national economy of India. Apart from these, there are one Polytechnic and different training institutes which supply the nation with skilled men of importance in the wake of industrialization of the country.

Welfare Activities.

In imparting help to the less privileged sections of the society, the District Welfare Department under the District Welfare Officer, has done considerable constructive work. Welfare of the Adibasis, Harijans and the Backward Communities was done in various forms comprising establishment of Welfare Institutions, construction of hostels, distribution of stipend and book grants, construction of wells for drinking water, housing loan and many other works. Apart from this, Coal Mines Welfare Organisation under the able Welfare Commissioner has been trying even beyond its limits to promote welfare to the workers engaged in such a vital industry as coal which has rightly been stressed as the 'Steel Anchor' of the country's industrial prosperity.

Small Savings.

In the field of small savings this district has been ahead of all other districts of the State in mobilising the small savings of the people. This is as credit worthy as anything on the part of the small savings organisers who are trying their best to mop up the surplus money in form of small savings which can be utilised for the development of the country.

With the tempo of expansion and all-round development germinated in this rich industrial belt of Dhanbad, this district stands as the "Industrial Heart" of the State. The district provides the nation with the peaks of modern enterprises employing the latest flow process of techniques. It also provides the nation with its immense potentialities for further industrialization, which, with the march of time, would ripple onwards to a wider circle of economic transformation towards a self-sustaining and self-generating growth of the economy.

IMPACT OF COMMUNITY DEVELOPMENT BLOCK ON THE TRIBAL PEOPLE OF TUNDI BLOCK.

The Community Development Project represents an integrated approach to the problem of rural uplift and development centred round agricultural production which, in view of the importance of food in the country's economy, has necessarily to be in the forefront.

Its basic aim is to effect material, social and psychological improvement of the rural population, and the improvement of their technique in the matter of agricultural and industrial production. It seeks to provide such means, facilities and agencies as would create an environment in which the villager is able and willing to

improve his lot by utilising the fruits of research and modern technical aids in the spheres of better agriculture, better animal husbandry, and better health; broaden his mental horizon through increased opportunities for basic and social education; improve the social and economic life in the village by building up co-operative institutions, whether as multi-purpose societies or *Gram Panchayats*, which would help stimulate cultural, social and educational activities.

The Community Development programme was started in the district in 1954 with the opening of a Development Block at Topchanchi in police-station Topchanchi now in Baghmara subdivision of the district. Since then the programme has steadily extended and nine Blocks have been established. Tundi started in 1957 is one of them.

Distribution of Tribal Population.

The tribals form more than a quarter of the population in the northernmost part of Dhanbad which consists of the Parasnath and Tundi ranges and groups of inconspicuous hills lying north of the Grand Trunk Road and comprised in the jurisdiction of Topchanchi, Gobindpur, Tundi and Nirsa police-stations. The tribals are scattered in all parts of Dhanbad but they are numerically small in areas lying south of the Grand Trunk Road, as would appear from the following table according to the *District Census Handbook of 1954*, pages 8 and 77:—

Name of place.	Total population.	Persons.			Percentage (Scheduled Tribe).
		(Scheduled Tribe).	Male (Scheduled Tribe).	Female (Scheduled Tribe).	
1	2	3	4	5	6
Dhanbad district	731,700	114,529	57,137	57,392	15.6
Dhanbad rural	658,098	104,629	52,315	52,314	15.8
Dhanbad urban	73,602	9,900	4,822	5,078	13.4
Jharua Revenue <i>thana</i> (excluding Dhanbad, Jharua and Sindri towns).	261,169	24,867	12,141	12,726	9.5
Topchanchi	160,065	12,432	6,481	5,951	7.7
Gobindpur, Nirsa and Tundi Revenue <i>thanas</i> .	236,864	67,330	33,693	33,637	28.4
All towns of Dhanbad district	73,602	9,900	4,822	5,078	13.4

In Tundi P.-S. which is adjacent to the district of Santhal Parganas in Bhagalpur Division and which covers 80 per cent of the forest and hills of Dhanbad they form nearly half of the total population in the area.

As stated above Tundi Block was established in 1957. It covers an area of 152 square miles with 296 villages and 24 *Gram Panchayats*. According to 1961 Census its total population is 59,545 persons, i.e., 30,252 males and 29,293 females. The tribal population of the Block is 49 per cent.

The impact of Community Development Block on the tribals was sought to be studied in eight selected villages, namely, Laherbari, Sinduaritand, Karmatand, Biranchi, Jhinaki, Naro, Baghmara and Persatand. The background of these villages is indicated below:—

- (a) *Laherbari*.—This village is situated at a distance of about 5 miles from Tundi, the Block headquarters, and about 27 miles to the north-east from Dhanbad, the district headquarters. It has an area of 253.70 acres and 34 households and a population of approximately 167 persons. So far as communication is concerned it has got no proper road. It has a village *katcha* road on which bullock-cart only can move.
- (b) *Sinduaritand*.—The village is situated at a distance of about 5 miles from Tundi, the Block headquarters, and about 27 miles towards the north from Dhanbad. It has an area of 313.96 acres. The village has 33 households and a population of approximately 158 persons. It has no proper road. It can be approached only on foot.
- (c) *Karmatand*.—The village is situated at a distance of about 5 miles from Tundi towards north and about 27 miles from Dhanbad, the district headquarters. It has an area of 628.59 acres. It has 64 households and a population of approximately 352 persons. The village is connected with Tundi by a *katcha* road.
- (d) *Biranchi*.—The village is situated at a distance of about 5 miles from Tundi towards the south-east corner and about 20 miles from Dhanbad, the district headquarters. It has an area of 283.63 acres. It has 22 households and a population of approximately 120 persons. The village is connected by a *katcha* hilly road.
- (e) *Jhinaki*.—The village is situated at a distance of about 7 miles from Tundi towards west and about 29 miles from the district headquarters. The village is connected by a gravelled road from Tundi, the Block

headquarters. It is easily approachable by jeep. It has an area of 346.30 acres. It has 35 households and a population of about 318 persons.

- (f) *Naro*.—The village is situated at a distance of about 9 miles from Tundi towards west and about 31 miles from Dhanbad, the district headquarters. The village is connected by a District Board gravelled road from Tundi. It has an area of 325.39 acres. It has 35 households and a population of approximately 131 persons.
- (g) *Baghmara*.—The village is situated at a distance of about 10 miles from Tundi towards south-east and about 32 miles from Dhanbad. The village is encircled by hills. It has got no road communication. People can go in this village from village Jhinaki only by foot with great difficulty. It has an area of 247.14 acres. It has 20 households and a population of approximately 169 persons.
- (h) *Persatand*.—The village is situated at a distance of about 4 miles from Tundi towards east and about 25 miles from Dhanbad. It has got a *katcha* road from Tundi on which only bullock-carts can ply. It has an area of 457.51 acres.

Of these villages only Persatand has a population of 59 per cent tribals and 41 per cent non-tribals. The rest have nearly cent per cent tribal population.

A study was made as to the occupations of the tribals and the main trends of their economy. The study discloses that the main structure of the economy continues to be just the same as in the previous decades. The main pursuits are still of certain types of unsatisfactory agriculture, rearing of cattle, pig and poultry, sale of jungle produce and working as a labourer in fields elsewhere and in the collicries. The economic incidence continues to be poor. Details regarding the various pursuits are indicated below.

Agriculture and Animal Husbandry.

The lands of all the villages visited by the investigators are hilly and terrace agriculture is in practice. The only crop that is grown is paddy which depends solely on timely rainfall for there is no arrangement for irrigation. In years of scanty rainfall there is very little of paddy harvested and tribals suffer much. To improve their agriculture the Tundi Community Development Block has introduced improved seeds available from grain *golas* at Tundi and Jhinaki meant for the tribals.

In the year 1962 the Community Development Block supplied—

- (i) improved paddy seed—two maunds to village Biranchi for about 20 acres of land, two maunds to village

Laherbari for about 15 acres of land, three maunds to village Persatand for about 20 acres of land, twenty maunds to village Naro for about 10 acres of land, twenty-five maunds to village Karmatand for about 30 acres of land, thirty-one maunds to village Jhinaki for about 40 acres of land and 40 maunds to village Sinduaritand for about 45 acres of land.

Improved seeds were distributed in the villages, but very little of improved type of crops or rice collected in the tribal households was seen. Evidently the villages that took more than two to three maunds of improved paddy seeds utilised it for daily consumption. The seed supplied was not adequate even for agricultural purposes in villages, Biranchi, Laherbari and Persatand;

- (ii) manures (ammonium sulphate)—three maunds to village Biranchi for about 16 acres of land, three maunds to village Karmatand for about 15 acres of land, four maunds to village Naro for about 8 acres of land, five maunds to village Sinduaritand for about 15 acres of land, six maunds to village Laherbari for about 25 acres of land, nine maunds to village Persatand for about 35 acres of land, and 30 maunds to village Jhinaki for about 15 acres of land.

From the figures mentioned above it is quite clear that the distribution of manures was quite inadequate for the land.

When questions were put by the investigators to villagers of all the eight villages regarding the impact of the improved seeds and manures, they replied that they got better produce whenever they applied improved seeds and manures. They further said that everything depended on timely and adequate rainfall. Those villagers who took improved type of seeds and manures from the Block authorities had got at least five to six *bighas* of land.

The attempts of the Community Development Block to introduce Japanese method of paddy cultivation have not been successful because of the rocky soil and want of irrigation. The area is not suitable for this type of cultivation unless the skill is continuously spoonfed at an enormous cost. Attempts to sink wells have proved abortive and the people have no money to make their own arrangements for irrigation or fertilizers. As a result the old primitive method of cultivation was possible and found in the villages visited.

The incidence of indebtedness is extremely high and the investigators suggested that practically no tribal family was free from indebtedness. Under money economy the tribals have been getting

into more debts and the fact that money is easily available from the *mahajans* has not been to their good. Barter economy was better for the tribals.

The Community Development Block has not been of much help to liquidate the indebtedness. The tribals are born in debt, live in debt and literally die in debt. Their income is mostly swallowed up in payment of the interest for the loans. But partly owing to their improvidence and partly owing to the heaviness of indebtedness there was not much of final liquidation of the debts. Stipulation was to pay back 25 per cent above the quantity of grains borrowed. In some cases the quantity borrowed had not been repaid. This was either due to the fact that the crops were poor or that they had eaten up a portion of the seed and a quantity of the produce without thinking of repayment. It is also gathered that a particular political party had made some propaganda to the gullible amongst the tribals that if they would vote for the party there would be exemption from the payment of the loans of seeds. The grain *golas* for the tribals have, however, brought a modicum of relief. Four families of village Biranchi, three families of village Laherbari, six families of village Persatand, two families of village Naro, twelve families of village Karmatand, fifteen families of village Jhinaki and twenty-nine families of village Sinduaritand got grains from grain *golas* of Tundi and Jhinaki.

Poultry farming has been carried on by the tribals from time immemorial. But the breed kept by them was of the ordinary type which used to lay not more than 12 to 13 eggs at a stretch and then stopped laying eggs for about a month. The egg production was, therefore, not more than 100 per hen per year. The Community Development Block began supplying them with improved type of poultry and eggs. Of the villages, visited by the investigators, Naro was supplied with two eggs of improved type in 1962 to one person, Jhinaki with four birds of improved type in 1958 to two persons, Persatand with 13 birds and 22 eggs of improved type to 13 families, Sinduaritand with two birds and nine eggs of improved type to two persons, Laherbari with 18 birds of improved type to 15 persons and Biranchi with one bird and eight eggs of improved type to one person in 1962.

The tribals took to the poultry with great avidity, so much so that the Block could not supply their demands. Evidently there has been an increase in the production of eggs but the investigators could not get a single egg from any household of the villages Baghmara, Jhinaki and Naro, though there were quite a good number of birds both improved and ordinary types as seen by the investigators. Approximately 100 birds were seen in each of the villages. There were quite a good number of cross-bred birds at villages Laherbari, Karmatand, Persatand, Jhinaki and Naro. The aversion to sell eggs locally was found to be due to the idea that better prices could be had if eggs were sold at the market.

The Block office appears to have given substantial help for preventing diseases of the birds. The villagers of villages Laherbari, Sinduaritand and Jhinaki mention that injection had been given to the birds and tonic pills provided.

The improvement in the breed of livestock was not found in any of the villages visited.

The tribals have been rearing pig from time immemorial. The Community Development Block has tried to introduce improved type of pig, but it appears that the improved type of pig is more susceptible to diseases than indigenous ones. The Block authority had distributed one improved type of hog in each of the villages Karmatand, Sinduaritand and Jhinaki. There was no supply to other villages. It was learnt that the hogs distributed to villages Karmatand and Jhinaki died. The investigators found only one hog of improved type and that in village Sinduaritand only. There has been very little of improvement in the breed of pigs owing to inadequate supply of hogs.

Rearing of goats and sheep is an indigenous occupation of the tribals. There has been no improvement in breed as there was no supply of ram of improved breed either in the villages or in the service arranged at the Block headquarters.

The number of sheep found at the tribal villages was large but there was no utilization of the wool. The sheep were sold to Calcutta. Higher bred sheep and shearing of wool for separate sale could have improved the economic incidence of the tribals.

The indigenous forest produce of grass, leaves and seeds could have been put to better use if ideas of improved ware were given. As none has been offered, the tribals still produce a small number of baskets, leaves cup (*dona*) and other wares of inferior quality, the sale of which is localised.

Education.

Prior to the establishment of Tundi Community Development Block there were only two Middle schools located at villages Maniadih and Tundi. Now there are Primary schools at villages, Jhinaki, Laherbari and Biranchi. There is also a High school at Tundi. There is a library also containing 30 books only at village Jhinaki. Before the establishment of the Block very little attention was paid towards education by the tribals.

The location of the eight villages visited by the investigators is such that very few officials willingly visit these villages. But with the opening of the Block, villages are being visited by officials and non-officials. The Block had opened social centres in the villages Baghmara and Biranchi to educate adults. It is gathered that through these centres about 20 persons of village Baghmara and about 30 persons of village Biranchi were benefited.

Six boys of Baghmara of whom one student gets Rs. 15 as stipend from the Welfare Department and five students of Naro read in Meriadih school; five from Persatand; 15 from Karmatand; 13 from Sinduaritand and 15 from Laherbari attend the Laherbari school; 32 boys of Biranchi read in Biranchi school; and 15 boys and five girls of Jhinaki read in Jhinaki school. Five boys of Jhinaki read in Mariadih school, all of whom get Rs. 15 per month as a stipend. About 35 Adivasi students read in Tundi High School and get Rs. 20 each per month from the Welfare Department. It is doubtful if the tribal boys in these villages would at all have come to the schools if they were not given Government stipends. There has to be a constant stimulus in the shape of the teacher going round the villages to collect his students. The reason is that while elders engage themselves in cutting timber and other heavy work, the tending of cattle, goats and sheep devolves upon the children of school-going age. One example may be cited to illustrate the handicap caused by the customs prevalent amongst the tribals. The custom of early marriage is prevalent amongst the tribals. The husband has to be with his wife at least on every Sunday and failure to do so leads to divorce by the wife. One such case was found in village Laherbari, where one student had for this reason to discontinue his studies after passing the Secondary School Examination. The result is that the education of the tribals in schools and colleges is much hampered, so much so that a big hostel for tribals at Tundi constructed by the Welfare Department remains deserted.

Health and Sanitation.

The Santhals in spite of their poverty live neatly. The contribution of the Community Development Project towards living in better sanitary condition is in introducing vaccination only. Inoculation has not been popular. There does not appear to be any other vital help. Regarding sources of water-supply excepting the repairs of few *choas* (shallow wells dug in low-lying area to collect water from whatever sources available), nothing has been done.

Dispensaries are becoming popular. But it is only after they have tried indigenous medicines and witchcraft and failed in curing the disease thereby that they come to dispensaries for treatment. The villagers of Jhinaki, Baghmara and Naro wanted health sub-centres in their localities but the villagers of other villages that were investigated did not evince any desire for any such centre. The only dispensary is at Tundi which is at a distance of 8 to 10 miles from the villages.

Gram Panchayat.

The tribals have their own indigenous *Panchayats* which continue to exercise the same influence as before. The *Gram Panchayats* set up by the Government have very little impact. Luckily the *Gram Panchayats* have not done the mischief in introducing litigation. There is practically no litigation amongst the tribals.

Co-operative Society

Co-operative Society has been started in village Jhinaki which caters for the villages in vicinity and has 32 members. It advances short-term and medium-term loans to the members for agricultural purpose. As reported it had advanced Rs. 1,000 in 1960-61 and Rs. 450 in 1961-62 for purchase of bullocks, seeds and manures. No other villages visited by the investigators have any co-operative society of their own.

Social Impact.

There has been a shift towards wearing of shirts, bush shirts, blouses and underwear amongst the tribals. This is partly due to the contact with Block authorities. The Block authorities have also encouraged the organisation of dancing parties among the tribals. It may be mentioned that song and dance are an integral part of their life.

Conclusion.

Out of 296 villages under the Tundi Community Development Block a sample survey of the activities and effects of the Block on eight essentially tribal villages was made. The aims and objects of the Block have already been discussed in the report. So far as the tribal villages are concerned this block along with the other blocks has one and the same pattern.

The impact has been only very partially successful: the main impediments are the inherent conservatism and some quaint social customs of the tribals, their poor economic incidence, the rocky nature of the soil and a certain amount of lack of proper supervision by the Block authority. Sinking of wells for irrigation or drinking purposes is practically impossible and an unwise experiment in introducing the Japanese system of paddy cultivation was probably a waste of money. The *Gram Panchayats* do not appear to have had any effect. The little progress in education was entirely due to subsidies and the teacher has to go round to collect these students.

Facilities in loan of improved seeds and manures were misused by appropriating them for immediate consumption. A slight improvement in poultry rearing was seen but the handicap was in very small doses of distribution of better eggs and pullets. As a matter of fact more concentrated efforts in improvement of poultry were desirable instead of trying an all-round well ramified scheme. The money wasted in the construction of wells or the introduction of Japanese method of paddy cultivation could have been better utilised by distributing more eggs and pullets or hogs. The villages remain where they were so far as land use is concerned and there has been no expansion apparently in the acreage of cultivation or in quality of the produce. Employment chances remain as they were.

But for the collieries the tribals might have had to starve. The ready cash money earned in the collieries is not again in their income as the incidence of intoxication has gone up. There has, however, been a slight change in the improvement in their dress and in taking to allopathathic medicine. The tribals have also become conscious of the good work veterinary science can do. Their complaint, however, is that they have to walk a long distance to attend the health sub-centres or the veterinary dispensaries.

Their diet still consists of rice, *mahua* and *pier* fruit with a little addition of hunted birds and beasts. The *Handia* (home-brewed liquor) is the main beverage.

For cash credit they would go to the *mahajans* and be in perpetual debt.

The co-operative movement has not made much headway. There is no improvement in cottage industry or in marketing facilities.

In short the impact of the Community Development Block on the life of the tribals, except in matters of health and medicine and to some extent in education has been negligible. There has been no change in the village leadership. It is confined to the tribals, and non-tribals, even if elected as *mukhias* of *Gram Panchayats*, do not exert any real influence on them. Modern ideas like birth control and castelessness have not yet entered these villages, rather are laughed at. The primitive system of self-help still continues and they have not yet imbibed any new ideas so much so that the only compost pit in the villages visited is at Biranchi and that due to the efforts of Village Level Worker and has not been taken up by the indigenous population.

ECONOMIC STRUCTURE OF THE SEMI-TRIBAL VILLAGE RAJGANJ, P.-S. KATRAS.

A survey was made at Rajganj village to study the economic structure of a semi-tribal village that has undergone a rapid change in the last one decade due to its proximity to Dhanbad, the headquarters of the district and the centre of colliery and other industrial activities.

Rajganj is about 10 miles north-west from Dhanbad on Grand Trunk Road. The total population of the village according to 1951 Census was 2,279 and in 1961 Census its population has increased by about one thousand.

The village though situated in a tribal zone has recently undergone a complete change. Due to industrialisation and spread of education and free association with different types of people in the collieries and the town, the tribals and the non-tribals here have changed a lot. It is difficult now to differentiate between the tribals and the non-tribals. Their dress and language are quite similar,

The only thing which goes to separate them from the non-tribals is that they keep their houses more tidy and decent than the non-tribals.

It is expected that after a lapse of a few more years this semi-tribal village will lose all vestiges of tribalism.

The village is spread over an area of 809.84 acres and about 50 per cent of the total land is cultivated. There are now (January, 1963) 442 households in the village. The village is connected by quick bus services with Dhanbad town. It has a post office, a police-station, two Middle schools, a High school, a dispensary, a maternity and child welfare centre, and a veterinary dispensary. It is also the headquarters of village level worker, *Mukhiya* and the *Sarpanch*.

During the survey, emphasis was laid to describe the role of caste in relation to economic structure; the important economic activities in the village like cultivation and animal husbandry and finally the cycle of activities of both males and females of different castes throughout the year.

Caste and Economic Structure.

The village has an entirely settled population. Even the aborigines like Santhals have settled down to cultivation which is the main stay of the village population. It has a heterogeneous caste composition as will be evident from the table given below:—

*Caste Composition.**

Caste.	No. of households.
1. Brahman	2
2. Rajput	1
3. Kayastha	1
4. Swarna Banik Bengali	25
5. Muslim	50
6. Agrawala	20
7. Mahuri	10
8. Bania Jayaswal	7
9. Mandal	4
10. Kumhar	50
11. Teli	50
12. Halwai	15
13. Koeri	6
14. Chamar	35
15. Dhobi	5

*Supplied by the Gram Sevak of the village.

Caste.			No. of households.
16. Barhi	..	..	1
17. Kurmi	..	..	50
18. Dhewar	..	..	5
19. Nai	..	..	8
20. Santhal	..	..	50
21. Bauri	..	..	2
22. Mahra	..	..	1
23. Lohar	..	..	5
24. Barai	..	..	30
25. Darji	..	..	9
Total			442

The Bawris, Maharas and Dhiwars are on the periphery and may be described to belong to the category of semi-tribals.

There are thus about 25 castes in the village. The old order of the village society enjoins upon each caste to perform certain functions which are interdependent and complementary and weave the economic system into a single integrated unit. All the castes are more or less associated with cultivation except Dhiwar, Bawri and Mahra. Some castes such as Kumhar, Halwai and Chamar, etc., follow their traditional caste occupation at well but Swarna Banik Bengalis have left their traditional caste occupation, i.e., goldsmithy and are busy in cultivation, care of animals and *bidi* making. Broadly speaking the caste men may be grouped into the following three categories according to their economic function:—

- (a) Agriculture followed by the Brahmans, Rajputs, Muslims, Koeris and Santhals.
- (b) Occupations ancillary to agriculture followed by the Lohars, Carpenters and *Mahajans*.
- (c) Various types of social services followed by the Nais, Darjis and Kumhars.

The interdependence of the different castes in the economic organisation of the village becomes more emphasised during the occasions of marriage, festivals, etc., when each caste has a specific contribution to make. It was found that the services rendered by Lohar, Nai, Dhobi and Darji castes cater to the needs of a group of families at remuneration generally given on an annual basis either in cash or kind at the time of harvesting of grains. Due to impact of urbanisation and industrialisation this practice is on the decline.

At the present moment owing to the economic shifts there is much or less rigidity in following particular avocations and caste occupations are definitely on the decline. This shift has been made

more possible due to the general industrialisation of the district. Quite a good percentage of the sons of agriculturists, cobblers or landless labourers are working in the same trade or in the colliery.

The economic functions of the different castes in the village are indicated below:—

Lohar.—There are five households of *lohars* or blacksmiths in the village. They make cart wheel, agricultural implements and other household articles. There is no barter system in this village. The produce is consumed locally or in the neighbourhood. These village *lohars* are allergic to do any other kind of work. They are well occupied.

Nai.—There are eight households of *nais* or barbers in the village. They are not attached to a group of families. At the time of harvest and marriage they get paddy and other grains from agriculturists but this is not obligatory. They take up other kind of manual work. They would not have got sufficient livelihood if they stuck to their caste-occupation.

Darji (tailor).—There are nine Darji families in the village. They are Muslims and live in the Muslim pocket of the village but their shops are in *bazar* area. They are quite busy with their work and generally they do not do any other kind of work to add to their earnings.

Kumhar (potter).—Besides making of earthen ware some of the Kumhars also make *bidi*. They make just sufficient for their use. The children have started taking up other types of manual work.

Agrawala.—The eighteen families of Agrawalas are engaged in money-lending or other form of business. They are comparatively well-to-do. They are readily available to those who need credit. There has been no decline in their business.

Chamar (cobbler).—The Chamars are not usually confined to their caste-occupation. They also work as agricultural labour.

Santhal.—Santhals occupy about 13 per cent of the total population of the village. Their houses are not scattered. They do not depend on agriculture alone because agriculture provides them only during sowing and harvesting seasons. During the other period of the year, i.e., January to May they work in the collieries or in Dhanbad or other towns.

The problem of indebtedness among Santhals specially is very acute in the village. Almost every family is in debt in spite of the fact that they earn quite well. They are still improvident by nature. The Community Development Block has not been of much help to liquidate the indebtedness.

Animal Husbandry.

The Santhals keep domestic livestock. There were about 100 goats, 30 sheep, 75 cattle and 60 birds in their houses. Lately, some Muslims and Chamars have taken to cattle rearing. Some of the other caste men like Brahmans, Rajputs, Kayasthas and Bengalies regard sheep and goat rearing beneath their dignity.

A veterinary dispensary has been started in the village and the villagers are benefited. About 400 acres of land of the village are uncultivated because it is hilly area. This is the grazing land. Cultivated fields are also allowed for grazing after harvesting is over. The quality of livestock is very poor. Most of the livestock produce goes to meet the requirements of the family itself. A part of it goes to the village *mahajan* in repayment of the debt or goods obtained from him.

System of Agriculture.

The main stay of the village is agriculture. On local enquiry it was found that in every household about two to three persons were earning members. Traditional type of cultivation is in practice. Better land use has not yet come into vogue although the village is so close to Dhanbad.

Paddy and maize are the main crops. Paddy is grown in about 400 acres and maize is grown in up lands. Usually the land-owner is his own ploughman. Occasionally labour is hired. There is no scarcity of labour.

Cycle and Activities.

The following chart gives the cycle of the economic activities of the males during the cultivating season and the off season for cultivation:—

Activities of male members.

Serial no.	Caste.	Cultivating season (May to December).	Non-cultivating season (January to May).
1	Agrawala ..	Cultivation, money-lending, shop-keeping.	Shop-keeping, money-lending.
2	Muslim ..	Cultivation, care of livestock	Care of animals, coal cutting.

Serial no.	Caste.	Cultivating season (May to December).	Non-cultivating season (January to May).
3	Kumhar ..	Agricultural labour, pottery, care of animals.	Pottery, <i>bidi</i> making, coal cutting.
4	Halwai ..	Cultivation, care of animals, sweetmeat making.	Sweetmeat making.
5	Chamar ..	Cultivation, care of livestock, flying skin of dead bodies.	Cloth washing, care of animals.
6	Dhobi ..	Cultivation on <i>bataia</i> land, care of animals, cloth washing.	Cloth washing, care of animals.
7	Santhals ..	Cultivation, care of animals and livestock, coal cutting.	Care of animals and livestock, coal cutting, rope making.

So far as economic activities of females of different castes are concerned, the females of Brahmans, Rajputs, Agrawalas and Bengalis usually perform household duties and do not engage themselves in manual labour in connection with agriculture. Women folk belonging to Kumhar, Chamar, Dhiwar do a certain amount of agricultural labour or helping in other work. Thus Kumhar women scrape and bring earth for their husband work while Barber women polish the nails of women. Some of the Santhal and Chamar women work in collieries.

MISCELLANEOUS OCCUPATIONS.

Agriculture, trade, commerce, communication and transport, etc., provide the occupations for the bulk of the population. A small percentage of the population is engaged in public administration, learned professions and domestic services, etc. The middle class and the lower middle class come from these persons who may be said to follow miscellaneous occupations.

It has to be mentioned that the only reliable statistics for miscellaneous occupations could be had from *District Census Handbook* based on 1951 figures.

The *District Census Handbook* for 1961 Census has not been published. Detailed figures are not available so far. Owing to the enormous expansion due to the projects in the Third Five-Year Plan and other reasons there has been a considerable accretion to the adherence of the miscellaneous occupations. In some cases the reported figures for 1951 *Census Handbook* appear to be an underestimate.

Public Administration.

The *District Census Handbook for 1951* has given the statistics for Public Administration under "Health, Education and Public Administration". The figures are as follows:—*

	Males.	Females.	Total.
1. Health, Education and Public Administration.	4,718	784	5,502
2. Police (other than village watchmen).	358	nil	358
3. Village officers and servants including village watchmen.	24	nil	24
4. Employees of State Government	303	nil	303
5. Employees of Union Government	1,376	nil	1,376

Without contradicting these figures we have to refer also to the statistics in the text on "Law, Order and Justice". Some of the figures in that text refer to the period after 1951. These figures were collected for this Gazetteer.

LEARNED PROFESSION.

Persons under this category have the background of 'Education and Culture' and form the backbone of the society. They are lawyers, educationists, engineers, doctors, skilled professionals, writers, journalists, etc., either in public or private sector.

The figures of teachers inclusive of the different categories according to 1951 *District Census Handbook* are given below:—

	Males.	Females.	Total.†
Educational Services and Research	1,956	234	2,190

These figures are to be taken with reference to the figures given in the text on "Education and Culture". As mentioned in the text on "Education and Culture", there were in 1961-62, 3,166 teachers employed in schools and colleges, out of which 245 were professors and lecturers of colleges including the technical colleges. The above figures include the teachers of primary, middle, secondary, oriental, professional and social education in Dhanbad district. Without again contradicting the disparity of figures we may say that, both the set of figures may not be absolutely correct.

So far as doctors are concerned the *District Census Handbook of 1951* mentions 1,214 persons engaged in medical and health services of the district. Apparently the figure is an underestimate as it should include not only qualified doctors, nurses, compounders and

* *District Census Handbook, Dhanbad*, published in 1954 (pp. 42 to 44).

† *District Census Handbook, Dhanbad*, published in 1954 (p. 43).

midwives but also the unqualified quacks, homeopaths, *kavirajs*, *hakims*, etc. The difficulty is the want of statutory obligation for barring unregistered doctors from practising. The figures in the *District Census Handbook of 1951* must have undergone a large addition by now. The text on "Medical and Public Health Services" may also be looked into.

The figures for legal profession have not been separately given in 1951 *District Census Handbook* but have been clubbed with businessmen and said to be 2,169 persons. They do not give any indication as to the actual number of persons following the legal profession.*

An investigation was made from the Secretary of the Bar Library and it was reported that there were 120 legal practitioners of whom 21 were advocates. This figure does not include the pleaders' clerks, stamp venders, deed writers or various other people who make a living out of the legal cases and the courts.

Arts, letters and journalism claim a very small number. According to 1951 Census there were five persons. This figure appears to be an underestimate as there are quite a few part-time press correspondents and writers. Many of the teachers and professors have taken to journalism and writing as a part-time occupation.

Religion claims a small number of exclusive adherents such as priests and missions but their number is not separately available. In the present day economic trends a Hindu priest or a Muslim divine will follow other occupations as well. Quite a number of drones are also covered by this category. In 1951 *Census Handbook* 267 males and 6 females were reported to be engaged in religious, charitable and welfare services. † No investigation was made to find out the present number. The 1961 Census figures are not available.

In the text on 'People' there has been a coverage on different religions.

Domestic and Personal Services.

The figures of persons engaged in domestic and personal services according to 1951 Census are as follows†:—

	Males.	Females.	Total.
1. Services otherwise unclassified	12,249	840	13,089
2. Domestic services ..	1,445	340	1,785
3. Barbers and beauty shops ..	1,032	18	1,050
4. Laundries and laundry services	201	52	253
5. Hotels, restaurants and eating hotels.	660	nil	660
6. Recreation services ..	290	96	386

* *District Census Handbook, Dhanbad*, published in 1954 (p. 47).

† *District Census Handbook, Dhanbad*, published in 1954 (pp. 45-46).

The present number under each of the categories must be more by now (1963).

The persons engaged in domestic services include cook, household servants, water carrier, grooms, etc. The lot of domestic servants has definitely improved. They are profited by the enormous expansion of other avenues of occupation and get a better pay and fooding. Many are engaged in part-time job in several families and make out a good living. Many of the previous domestic servants have adopted other occupations as rickshaw-pulling, working in hotels, office peons, *chawkidars*, etc. There is a dearth of domestic servants and this has been fully exploited for getting higher wages, lesser work and obligations. There is a constant interchange of occupations among this class of men. It is also possible that the same man is working as barber and a domestic servant or a peon in the office. The same man may be a cook and a peon or a newspaper vendor and a *khonchawalla* selling snacks.

In urban areas the average daily earning of a barber is not less than Rs. 2 to Rs. 3. His charges vary. The road-side barber will charge from one anna to annas two for a shave and four annas for a hair cut. There is no fixed charge for the female barber who visits houses particularly.

Laundries of the urban areas are better equipped and the owners of such shops have also to employ hired labourers due to the increase in the volume of business. Washing charge per 100 pieces in the rural areas varies from Rs. 10 to Rs. 15 and in urban areas from Rs. 12 to Rs. 20, the time taken for the service ranging from 1 week to 10 days or even more.

The district does not have any good hotel where a comfortable board and lodge are provided. Mostly there are cheap restaurants and eating houses. These hotels and restaurants are generally situated near the court compounds, cinemas and in the town *bazars*.

The tailoring profession has not been separately enumerated. Many independent tailors with their sewing machines are found in the district. In many cloth shops a tailor sits in a corner and carries on his work. No tailor earns anything less than Rs. 90 a month.

It has to be mentioned that Dhanbad being a highly industrial district, the number of persons following miscellaneous occupations is expected to be much larger than the figures quoted. There are a large number of Central Government Departments stationed within Dhanbad district and it is not known if the personnel in the Central Government Departments have been categorised properly. Many of them are highly technical men, administrators, doctors, engineers, mining experts, etc. The services personnel have not always got their own organisations to discuss on matters of common interest and ventilate their grievances. If there were such organisations it could

have been easier to collect figures for them. Some of the doctors are members of the Dhanbad Branch of the Indian Medical Association. The lawyers have their own Bar Association. But the teachers, the subordinates in Government service have not such strong and well-represented organisations and it is difficult to get definite figures. The persons engaged in various local self-government bodies have not got their figures correctly enumerated. The various statistics quoted in the different texts will also have to be considered in coming to have a somewhat correct appreciation of miscellaneous occupations. Persons who may be grouped under miscellaneous occupations play a very important role in the life of the district.

CHAPTER IX.

GENERAL ADMINISTRATION.

ADMINISTRATIVE CHANGES.

Dhanbad as a subdivision of Manbhum district has been described in the *District Gazetteer of Manbhum* as follows:—

“For administrative purposes the district of Manbhum is divided into the Sadar and the Dhanbaid (formerly Gobindpur) subdivision, with an area of 3,344 and 803 square miles respectively, the river Damodar forming a natural boundary line between the two. The Sub-divisional Officer of Dhanbad, who is ordinarily a Joint Magistrate, is assisted by a Sub-Deputy Collector. Other local officers are a Superintendent, a Deputy Superintendent of Police, a Civil Surgeon, and a District Engineer. The Inspector, Additional Inspector and Assistant Inspector of Schools for the Chotanagpur Division also have their headquarters at Purulia.”*

It has been mentioned elsewhere that Dhanbad was raised from a subdivision to a sub-district and then as a district from the 26th October, 1956 as a result of the implementation of the recommendations of the States Reorganisation Commission. The Governor of Bihar was pleased to direct that with effect from the 26th October, 1956, under Government notification no. A-9911, Patna, the 24th October, 1956 that there shall be formed a district to be known as Dhanbad district, with headquarters at Dhanbad, comprising the local areas included in Dhanbad subdivision and the Chas and Chandankiary police-stations of Sadar subdivision of the district of Manbhum.

Again as a matter of administrative convenience a new subdivision Baghmara was created, besides the Sadar subdivision.

The Subdivisional Officer of Baghmara has now his headquarters at Dhanbad and holds his court and office there. The selection of the site for the subdivisional headquarters at Baghmara has not yet been finalised.

The Sadar and Baghmara subdivisions have an area of 604.25 and 509.75 square miles respectively, according to the Census of 1961.

The Deputy Commissioner of Dhanbad, under the control of the Commissioner of Chotanagpur Division, is at the head of the district administration and is in charge of law and order and the development of the district according to the Five-Year Plan. As the Deputy Commissioner he exercises the powers conferred on him under the Code of Criminal Procedure and many other special Acts.

* *District Gazetteer of Manbhum* (pp. 246-247).

He is to see to the execution of all planning schemes in the district and as the head of the District Planning Committee it is his duty to co-ordinate the functions of all the nation building departments of the district.

The Deputy Commissioner is assisted by the following gazetted officers (as it stood on the 31st March, 1962):—

Additional Collector—1, District Development Officer—1, Senior Deputy Collector—1, Assistant Magistrate—1, Deputy Collectors—4, Sub-Deputy Collectors—4, District Panchayat Officer—1, District Welfare Officer—1, District Public Relations Officer—1, Land Acquisition Officers—2, District Statistical Officer—1, Treasury Officer—1, P. A. to Deputy Commissioner—1, District Accounts Officer—1, Block Development Officers-cum-Anchal Adhikaris—10 (distributed in the different subdivisions).

The Sadar subdivision has the following officers directly under the Deputy Commissioner:—

Subdivisional Officer—1, Deputy Collector incharge Land Reforms and Development—1, Railway Magistrate—1, Deputy Collectors—3, Sub-Deputy Collectors—3, *Anchal Adhikaris* and Block Development Officers—6.

The Baghmara subdivision has the following officers:—

Subdivisional Officer—1, Deputy Collector incharge Land Reforms and Development—1, Deputy Collector—1, Sub-Deputy Collector—1, *Anchal Adhikaris* and Block Development Officers—4.

The Deputy Commissioner is expected to keep himself in touch with all the officers of different departments of the State Government at the district level, such as the Senior Executive Medical Officer (Civil Surgeon), Superintendent and Executive Engineers of the different departments, District Education Officer, Public Health Doctors, District Agriculture Officer, etc., and help and guide them in their work. He has also to be in active contact with the various departments and institutions of Central Government at Dhanbad and there are quite a few of them. The Deputy Commissioner's responsibility of maintaining law and order brings him in touch with the large number of collieries and other industries. The control of many of them lies with the departments of the Central Government but the Deputy Commissioner has a great responsibility regarding them.

NATIONAL PLANNING AND COMMUNITY DEVELOPMENT.

With the advent of Independence in 1947 the character of the administration in India both at the Centre and at the States underwent a great change. Maintenance of law and order and the collection of revenue were the main features of the administration before

1947. The Police State was substituted by the pattern of a Welfare State and this had to be brought about slowly and cautiously. At the Centre the Planning Commission was set up to formulate ideas and schemes for the country at large and also to co-ordinate the development work at the States. The Centre placed large sums of money for this purpose which were to be given to the States. The Centre arranged in many cases not only the entire finance or proportionate finance but also the provision of technical aid.

The Planning Council and the State Planning Board were constituted at the State level also. The aim was to frame schemes for a proper and co-ordinated development of the rural areas. A further aim was to decentralise the activities of the State which were so long mostly concentrated at the district level. With this object the Five-Year Plans formulated at the Centre were taken up at the State level along with State schemes. Community Development schemes were started all over the district in the First Five-Year Plan. The Second Five-Year Plan underlined the work taken up and indicated an extension. The same work has been continued in the Third Year-Plan (1962).

The field of General Administration in a Welfare State is much wider and the various economic plans undertaken as a part of the State policy were to be partially implemented through the Community Development Projects and National Extension Service Blocks. Administration of the rural development projects and guidance of the decentralisation schemes underlining the importance of the villages became very important in General Administration.

The whole of Dhanbad district is being covered by the Community Development Blocks. There are 10 Blocks-*cum-Anchal* in this district, with headquarters distributed all over the district.

A Block covers a number of specified villages with headquarters and usually the name of the Block is after the name of the headquarters village. There is a Block Development Officer with a number of other officers under him such as a Doctor, a Statistical Supervisor, an Animal Husbandry man, a Social Organiser, etc. The Block Development Officer is entrusted with the working of the schemes and projects sanctioned and also to evolve schemes and projects for the all round development of the villages under him. He is not to be entrusted with judicial work so that he can devote his whole time for an intensive co-ordinated rural development of the area with the active participation of the people. If a Block Development Officer cannot draw out the co-operation of the people he has failed in his object.

THE DEPUTY COMMISSIONER AND HIS OFFICE.

The Deputy Commissioner or the District Magistrate has always been treated as the very pivot of the set-up.

With the growing complexity of administration there has been ramifications and special officers were posted for some of the administrative departments. Thus the Deputy Commissioner came to be helped by a gazetted Superintendent of Excise for the administration of excise affairs in the district, a Superintendent of Police for running the police administration, a District Sub-Registrar for the registration of documents, a Superintendent of Jail for running the day-to-day jail administration, a Senior Executive Medical Officer to run the medical department, etc. He was given a number of gazetted officers who were magistrates of various ranks for doing the executive part of the administration and also to work as judicial magistrates disposing of criminal cases. There were also Revenue Officers and as such designated as Deputy Collectors.

But the overall administrative supervision and responsibility still remain with the Deputy Commissioner. It is the Deputy Commissioner who is the invariable link with the State. He is to implement the State policy in every branch of the district. He is accountable to the Government for bad administration. The multifarious work of the Deputy Commissioner goes on multiplying but the Deputy Commissioner's office known as the Collectorate has retained almost the same pattern as has been evolved when the work is much less and there is more of executive work for the Deputy Commissioner and his staff.

So far as the subdivision is concerned the Subdivisional Officer is the executive head of his subdivision. His headquarters are within his subdivision. He holds in him the same type of functions and responsibilities as the Deputy Commissioner but is under the administrative control of the Deputy Commissioner.

The development work has been given a great emphasis in the present set-up of administration of the Welfare State. The evils of casteism are sought to be removed both by statute and by propaganda. A large number of welfare schemes have been taken up for the Backward Communities and Scheduled Castes and Tribes and projects of development have been started in various corners of the district. The abolition of *zamindari* had thrown the society into a whirlpool which has not yet subsided. The administrative set-up has had to change very considerably because of the abolition of *zamindari*. There is no intermediary link now between the State and the cultivators. The landless labourers have been thought of in the present overall schemes for the improvement of the country. All these changes at the district level were to be controlled by the Collectorate and had taxed to the utmost the set-up of the Collectorate, the office of the District Officer with its own old pattern. It was felt that this pattern must go. For this reason the State Government had deputed a senior I.C.S. Officer, Shri B. D. Pande, who studied the problems of the reorganisation of the districts and subdivisional offices and gave his report.

This scheme was implemented by the Government in July, 1958. By this order the set-up of the district offices has been completely changed to suit the new conditions.

Shri B. D. Pande felt that the best arrangement for the organisation of the main Collectorate office was to divide the Collectorate into seven principal sections as follows:—

- (1) Confidential—This was to be directly under the Collector.
- (2) General Office—This was to replace the English office.
- (3) Revenue Office—This was to correspond to the Revenue office set up on the abolition of *zamindaris*.
- (4) Development Office.
- (5) Establishment Office.
- (6) Legal Section Office.
- (7) Treasury and Accounts.

The proposed distribution of subjects was as follows:—

Section I—Confidential.

Section II—General.—(1) Law and Order, (2) Agrarian Disputes, (3) Maintenance of Public Order Act, (4) Collective Fines, (5) Police and Homeguards, (6) Requisitioning and derequisitioning of property, (7) Allotment of houses, (8) Soldiers, Sailors' and Airmen's Board, (9) Elections, (10) Census, (11) Cinemas and dramatic performances, (12) Licenses (Arms, Explosives, etc.), (13) Press, including examination of newspaper cuttings, (14) Public Relations, (15) Relief and Rehabilitation of displaced persons from Pakistan, (16) Evacuee Property Act, (17) Passports and visas, (18) Political Sufferers, (19) Domicile certificate, (20) Jails, (21) Supply and Price Control, (22) Anti-Corruption, (23) Assembly, Council and Parliament questions, (24) Local Bodies, i.e., Municipalities, District Boards, Notified Area Committees and other Union Committees, (25) Library, (26) Forms and Stationery, (27) Labour, including Minimum Wages Act, Workmen's compensation, etc.

Section III—Revenue.—(1) Land Reforms, (2) Tenancy Act, (3) Rent and cess, (4) Khas Mahal, (5) Rent Commutation, (6) Chaukidari, (7) Settlement, (8) Balabandi, (9) Malkhana, (10) Registration, (11) Charkhana, (12) Embankment, (13) Excise and opium, (14) Kanungo Establishment, (15) Taxation Measures, (16) Record Room, (17) Copying Department, (18) Certificate, (19) Nazarat, (20) Circuit House, (21) Land Acquisition, (22) Ferries, (23) Mining, (24) Treasure Trove, (25) Stamps, (26) Crop and Weather Reports, (27) Flood and Scarcity.

Section IV—Development.—(1) Five-Year Plan and Co-ordination, (2) District Development Office, (3) District Planning Committee, (4) District Education Committee, (5) Community Project and National Extension Service, (6) Local Development Works Programme, (7) Irrigation (major, medium and minor), (8) Reclamation of Wasteland, (9) Welfare of Scheduled Castes, Scheduled Tribes and Backward Classes, (10) Gram Panchayats, (11) Vested Zamindari improvement works, (12) Welfare activities of other departments including Grow More Food, (13) Statistics, (14) Forests, (15) Loans including Agriculturists' Loans, Land Improvement Loans, Loans under the State Aid to Industries Act, etc., (16) National Savings Scheme, (17) Works Staff in the District.

Section V—Establishment.—(1) Personal cases—maintenance of service books, character rolls, leave accounts, etc., of personnel employed under the Collector, (2) Appointments, postings and transfers, (3) Leave, (4) Departmental Proceedings, (5) Provident Fund, Gratuity (6) Pensions, (7) Security, (8) Bill and Budget Works of the Collectorate.

Section VI—Legal Section.—(1) Revenue and Judicial Munshikhana, (2) Civil suits, (3) Pauper suits, (4) Criminal motions, (5) Inspection of Trial Registers, (6) Appeals, (7) Correspondence with the Legal Remembrancer, (8) High Court, (9) Release of Prisoners, (10) Pleaders, Mukhtears and Revenue Agents, (11) Probate, (12) Religious Endowments, (13) Payment of Pleaders' bills, (14) Judicial Accounts, (15) Criminal Fines, (16) Law Agents and Law Clerks, (17) Other Criminal, Civil or Revenue Appeals or Motions and matters connected therewith, (18) Court Malkhana.

Section VII—Treasury and Accounts.—(1) Treasury and Accounts, (2) Sale of Stamps.

There was a certain amount of distinction between a Sadar subdivision and a mofussil subdivision. The recommendation of Shri Pande was that the Sadar subdivision should be organised more or less on the lines of mofussil subdivisions. The Sadar Subdivisional Officer was to have the following departments:—General Office, Election, Development, Confidential, Loans and Relief, National Extension Service and *Gram Panchayats*, Supply and Price Control, Minor Irrigation, Public Relations, Welfare, *Chaukidari*, *Nazarat*, Certificates, Library, Land Reforms—L. D. Fee—Revenue *Munshikhana*, Arms and Cinemas and other licences.

According to Shri Pande the Collectorate should also retain Probate, Civil Suits, *Malkhana*, Mines, Revenue Appeals, Settlement,

Embankment, *Balabandi*, and Land Acquisition Sections. Another important change that had to be taken cognisance of was that with the abolition of *zamindari* and the vesting of the *zamindari* into the State, the *Khas Mahal* Department of a district had lost its separate entity. The *Khas Mahal* was, therefore, to be completely merged with the Land Reforms Department. The Landlord Fee Department of the Collectorate had to be abolished as with the abolition of the *zamindari*, no money-orders had to be sent or acknowledged. It was recommended that arrangements should be made with the District Registration Office or the Sub-Registrar to deposit the Landlord Fee direct into the Treasury and send notices to the Circle Officers or the *Anchal Adhikaris* concerned.

Shri Pande had also given elaborate suggestions for the working of the Development Office, Welfare Departments, *Gram Panchayats*, Loans Department, Establishment Office, Legal Office, Inspections, etc.

He also felt that there should be adequate delegations of powers to officers at all levels, namely, *Anchal Adhikaris*, Subdivisional Officers, Collectors, etc. He had also indicated the necessity of a regular training of the newly recruited assistants and that the training should be closely integrated with practical training in the office itself.

The Chief Secretary in his no. OM/R-302/56-10443, dated the 20th December, 1957, had approved of the suggestions and informed the District Officers by name that the arrangements should be made forthwith to introduce the Reorganisation Scheme in the districts and subdivisions from the 2nd January, 1958. He reiterated that the Collectorate should be divided into seven principal sections as recommended by Shri B. D. Pande. He further expected that the Sadar Subdivisional Officers should function separately from the Collectorate like Mofussil Subdivisional Officer with the departments as recommended by Shri Pande and the Collectorate should, however, retain the nine subjects mentioned before as per Shri Pande's recommendations. There was a further confirmation of Shri Pande's Scheme in the letter of Shri M. S. Rao, I.C.S., Chief Secretary, bearing no. R2-302/56-CSR-365, dated the 9th July, 1958.

PUBLIC WORKS DEPARTMENT.

There are two divisions of the Public Works Department with headquarters at Dhanbad. These divisions are functioning under separate Executive Engineers with their headquarters at Dhanbad. They are under the control of a Superintending Engineer with his headquarters at Hazaribagh and the Chief Engineer, Public Works Department, Bihar, with his headquarters at Patna.

The main duties of the Executive Engineers are to supervise the execution of the schemes for roads and buildings, etc., and to supervise and control the work of the Subdivisional Officers. They have also

their responsibility in controlling the expenditure and make payments to the contractors.

The Dhanbad Division no. 1 with its headquarters at Dhanbad has two subdivisions namely, Dhanbad no. 1 with five sections, and Sindri subdivision with four sections. The two subdivisions are under the charge of two Subdivisional Officers with their headquarters at Dhanbad and Sindri.

There are nine sectional officers under the division to supervise the execution of work under guidance of the Subdivisional Officers who are responsible for the management and execution of work within their respective jurisdiction.

The Dhanbad Division no. 2 with its headquarters at Dhanbad has two subdivisions namely, Dhanbad no. 2 and Giridih subdivision of Hazaribagh district. This division was created in 1958 with headquarters at Dhanbad. Dhanbad no. 2 has three sections, viz., Gobindpur, Dhanbad section no. 2 and Dhanbad section no. 3. Giridih subdivision has four sections. There are two Subdivisional Officers, one is posted at Dhanbad and the other is at Giridih. They are assisted by seven sectional officers.

PUBLIC HEALTH ENGINEERING.

The Public Health Engineering Division was created in 1955 with its headquarters at Dhanbad. An Executive Engineer is the head of the division and he is under the administrative control of the Superintending Engineer with his headquarters at Ranchi. The headquarters of the Chief Engineer is at Patna.

There are five subdivisions namely, Dhanbad, Sindri, Giridih of Hazaribagh, Jharia and Jamadoba and each of them is under a Subdivisional Officer who is helped by overseers.

The main object of creation of this division is to execute Damodar Valley Water-Supply Scheme at the cost of Rs. 75 lakhs and Giridih Water-Supply Scheme at the cost of Rs. 32 lakhs.

ELECTRICITY DEPARTMENT.

The Electricity Executive Engineer with his headquarters at Dhanbad is in charge of Dhanbad Electricity Department. He is under the control of the Electrical Superintending Engineer, with his headquarters at Ranchi. The Chief Engineer, Electricity Department, Bihar, with his headquarters at Patna is the head of the department. This department has enormously expanded in the recent years.

The Executive Engineer is assisted by four Assistant Electrical Engineers with their headquarters at Dhanbad, Digwadih, Nirsa and Ganeshpur. They are in charge of the transmission and distribution in their respective jurisdiction. Below the Assistant Electrical Engineers are the overseers posted at Dhanbad, Katras, Joraphatak, Chhotatand, Gobindpur, Nirsa, Mukunda, Bhaga, Ganeshpur and

Dugdha. There are Government power sub-stations at Digwadih, Monitand, Nirsa, Ganeshpur, Dugdha and Mohuda.

About 128 towns and villages have been electrified till the end of 1962 (June). The important towns and villages electrified are Balliapur, Bhaga, Bhojudih, Chandankiary, Digwadih, Dumaria, Jamadoba, Jealgora, Jorapokhar, Lodna *bazar*, Patherdih, Tisra Dhanbad, Jharia, Kumardhubi, Chirkunda, Katras, Ganeshpur, Sindri, Topchanchi, Gomoh, etc.

The Electricity Board is supplying power to important consumers like Central Fuel Research Institute, Central Mining Research Institute, Indian School of Mines, Dugdha Coal Washery, Patherdih Coal Washery, Railways for Patherdih and Bhojudih, Superphosphate Factory, Water Board, Coke Plant, Jharia Coalfield Electric Supply and a large number of collieries and industrial loads.

The following statement will show the total work done up to the end of June, 1962 in Dhanbad district:—

1. *H. T. (High Tension) Extension in miles—*

33 K. V.	11 K.V.	6.6 K.V.	3.3 K.V.
58.35 miles	234.85 miles	..	10 K.V.

2. *L. T. (Low Tension) Extension in miles—*

One Phase.	Two Phase.	Three Phase.
25.42 miles	0.11 mile	78.20 miles.

3. *Distribution of Transformers—*

- (a) 500 K.V.A.—3
- (b) 400 K.V.A.—1
- (c) 250 and 300 K.V.A.—6
- (d) 200 K.V.A.—5
- (e) 125 K.V.A.—1
- (f) 100 K.V.A.—108
- (g) 75 K.V.A.—3
- (h) 60 K.V.A.—3
- (i) 50 K.V.A.—127
- (j) 25 K.V.A.—94
- (k) 5 K.V.A.—28

There will be a rapid extension of electric lines as the people are keen to have electric connections in their houses. This is an expanding department. The spread of electricity has also a great effect on the development of small industries driven by power in the villages.

AGRICULTURE DEPARTMENT.

The District Agricultural Officer is under the direct control of the Deputy Director of Agriculture with his headquarters at Ranchi and the Director of Agriculture, Bihar with his headquarters at Patna.

The District Agricultural Officer has two Subdivisional Agricultural Officers with their headquarters at Dhanbad Sadar and Baghmara (posted at Dhanbad). The Subdivisional Agricultural Officers are assisted by two Additional Subdivisional Agricultural Officers with their headquarters at Dhanbad Sadar and Baghmara (posted at Dhanbad). The Additional Subdivisional Officers are to look after the management of the Government Farms.

The District Agricultural Officer is assisted by a team of subject matter specialists in Agronomy, Botany, Horticulture, Chemistry, Engineering and Fisheries. Their job is to train the Village Level Workers and to collect information regarding the local problems with which the Agriculture Extension Supervisors, the Village Level Workers and the cultivators come across during the implementation of the agricultural programme and communicate them to the Regional Director of Agriculture, Kanke (Ranchi) for providing practical solutions. The Subdivisional Agricultural Officer is also assisted by a team of especially trained staff in Fisheries and Horticulture.

Field trials on fertilisers to find out the appropriate doses for different localities are also conducted throughout the district with the help of Field Assistants, posted in subdivisions and one Agricultural Inspector of Field Experimental Service under the District Agricultural Officer but in his absence the subject matter specialist in chemistry looks after the experimental work.

Usually there is an Agricultural Extension Supervisor at the headquarters of the Blocks to look after agriculture programme. They are under the administrative control of the Block Development Officers.

There are 12 Seed-Multiplication Farms of 25 acres each in this district. There is a District Experimental Farm at Baliapur of 100 acres.

There is one Plant Protection Inspector and a team of Field Operators to work against crop pests and diseases. There is a godown from where pesticides, sprays and dusters are sold to the cultivators.

EDUCATION DEPARTMENT.

The District Education Officer with his headquarters at Dhanbad is for the Education Department at the district level. The Regional Deputy Director of Education with his headquarters at Ranchi is his immediate superior. The Director of Public Instruction with his headquarters at Patna is the head of the department.

The District Education Officer is assisted by a number of officers. Each subdivision is placed under the charge of a Sub-divisional Education Officer with the headquarters at each of the civil subdivisional headquarters.

At the district level the District Education Officer is assisted by the District Superintendent of Education, District Social Education Organiser, Deputy Superintendent of Physical and Basic Education with their headquarters at Dhanbad. Besides, there is one Basic Deputy Superintendent at Dhanbad. There is a District Inspectress of Schools at Dhanbad.

There are two Deputy Inspectors of Schools with their headquarters at Dhanbad and Baghmara (posted at Dhanbad). There are 20 Sub-Inspectors of Schools in the district who are responsible for the educational activities in their respective circles. There is one Deputy Inspectress of Schools in the district posted at Dhanbad.

CO-OPERATIVE DEPARTMENT.

The Co-operative Department of Dhanbad district is divided into two circles namely, Dhanbad circle and Baghmara circle. The Assistant Registrar with headquarters at Dhanbad is also in charge of Baghmara circle.

He is under the Deputy Registrar, Co-operative Societies, Ranchi and the Registrar at Patna. One Inspector, Co-operative Societies designated as Co-operative Extension Supervisor and one Local Auditor, Co-operative Societies are posted at each of the Block headquarters.

To meet the credit needs of the members of the various types of Co-operative Societies in the district, there is one Central Co-operative Bank with its headquarters at Dhanbad. The Co-operative Bank is under the control of the General Manager posted at Dhanbad. There is also one Land Mortgage Bank functioning in the district located at Dhanbad. It is under the charge of the Manager of Central Co-operative Bank, Dhanbad.

COMMERCIAL TAXES DEPARTMENT.

The Dhanbad Circle of the Commercial Taxes was created in 1944. The controlling head of this department is the Commissioner with his headquarters at Patna. The Superintendent of Commercial Taxes used to be the administrative head of the circle but from August, 1958 the above post was upgraded to that of an Assistant Commissioner, Commercial Taxes and since then the Assistant Commissioner is the administrative head of the circle. There is one Additional Superintendent and six Assistant Superintendents to assist the Assistant Commissioner in the assessment of taxes and enquiries in respect of dealers.

The Department is concerned with the assessment and realisation of the following taxes:—

- (1) *Agriculture Income-Tax*.—It was levied in 1938 under the Bihar Agricultural Income Tax Act, 1938, but its administration was first taken over by the Commercial Taxes Department in 1944-45. The collection had

reached its peak in 1959-60 when it rose to Rs. 55,697.75 which was mainly due to enhancement in the rate of tax. In 1955-56 it had recorded a big fall to Rs. 1,611. The reason for it was mainly due to the taking over the *zamindari* by the State Government and the bad economic condition of the agriculturists in general.

- (2) *Bihar Sales Tax*.—It was introduced in the State from 1944-45. In 1961-62 the collection from this tax amounted to Rs. 1,08,67,815.70. The collection in 1957-58, 1958-59, 1959-60 and 1960-61 in this circle amounted to Rs. 41,37,443.80, Rs. 81,39,663.75, Rs. 1,05,72,749.31 and Rs. 1,04,21,599.81 respectively. The reason for downward and upward trend during the aforesaid years was mainly owing to the de-registration of a large number of dealers consequent upon the raising of the registerable limit from over Rs. 10,000 to over Rs. 15,000 from 1954.
- (3) *Central Sales Tax*.—Central Sales Tax Act, 1956 was introduced in Bihar from the 1st July, 1956 and the collection from this tax during the year 1957-58 was Rs. 17,32,068.16 and in 1961-62 was Rs. 43,11,846.52.
- (4) *Entertainment Tax*.—The administration of the tax was taken over by the Commercial Taxes Department in 1948-49. Its collection shows rise in 1960-61 and 1961-62 when there had been collection of Rs. 8,24,460.82 and Rs. 9,55,913.01 respectively.
- (5) *Electricity Duty*.—It was first levied in the district in 1948-49. The collection from this tax reached its peak in 1961-62. This increase was due to a rise in duty.
- (6) *Motor Spirit Sales Tax*.—Before 1949 this tax was realised by the Excise Department. In 1957-58 the total receipt from this tax amounted to Rs. 8,14,598.13. Since then there had been constant rise in the collection which rose to Rs. 15,58,410.01 in 1961-62. This was partly due to a rise in duty and the gradual improvement in the condition of the roads of the district which led to more vehicles using the roads.
- (7) *Passengers and Goods Transport Tax*.—It was levied for the first time in 1950. During the year 1953-54 the total yield from the tax was Rs. 2,37,095 but in 1961-62 it showed a downward tendency, i.e., the total yield was Rs. 375 only because the Act was declared *ultra vires* in September, 1960.

PUBLIC RELATIONS DEPARTMENT.

Prior to 1952 the Public Relations Department was known as Publicity Department. There is a Public Relations Officer with his headquarters at Dhanbad. He is assisted by an Assistant Public Relations Officer with his headquarters at Dhanbad.

The District Public Relations Officer and Assistant Public Relations Officer are under the immediate control of the Deputy Commissioner. The department is meant to be the link between the people and the State Government and particularly to disseminate information regarding the State activities.

In pursuance of the Community Listening Scheme, 169 radio sets have been distributed in the district from 1956 to 1962. Many of the radio sets have gone out of order and it is doubtful how far they are being utilised by the villagers without any restriction for whom they are meant.

A mobile publicity van equipped with a projector is taken round the district and free film shows and talks are arranged on various nation building subjects including agriculture, cattle improvement, health, village industries, education, civil duties, Five-Year Plan, etc. Publicity literature are also distributed.

There is an Information Centre at Dhanbad where several daily newspapers, magazines, etc., are kept for public consumption.

A Tourist Information Centre at Dhanbad has also been established this year. Information Centres at Block level have been established and supervised by District Public Relations Officer. A separate Directorate of Tourism has been created in 1962 and Dhanbad is expected to be an important tourist centre.

WASTE LAND RECLAMATION.

Waste Land Reclamation Section is a part of the Revenue Department. A Waste Land Reclamation Officer was posted in 1956 at Dhanbad and has been put under the immediate control of the Deputy Commissioner. The Waste Land Reclamation Officer is also under the control of the Director of Waste Land Reclamation, Bihar with his headquarters at Patna.

Waste Land Reclamation work in this district is being done—

- (i) by Land Improvement Loans granted to the cultivators;
- (ii) through subsidy, and (iii) manual labour done departmentally.

Land Improvement Loan—Land Improvement Loan is advanced to the cultivators for reclaiming their culturable waste lands. During 1961-62, Rs. 7,500 were distributed as Waste Land Reclamation Loan to the cultivators and 145 acres are said to have been reclaimed. There has been no check up if the actual reclamation has brought in any extra produce. No work is being done by State Tractor Organisation.

Subsidy.—A sum of Rs. 2,000 was allotted for conversion of culturable waste land into paddy fields with a target of 20 acres for the year 1961-62. During the year 1961-62 an amount of Rs. 1,373 had been spent with achievement of 13.73 acres only.

Manual Labour.—A sum of Rs. 7,000 was allotted by the Director, Waste Land Reclamation, Bihar, Patna. During the year 1961-62 the total amount was spent. The target for the year 1961-62 was 100 acres against which 112.70 acres have been reclaimed.

There is not much scope for waste land reclamation in this district.

Settlement of Railway Surplus Lands.

The South-Eastern Railway has made over an area of 62.989 acres and the Eastern Railway an area of 189.14 acres of land to the Waste Land Reclamation Department. Under Government instruction no. 2099-W.L.R., dated 8th|9th December 1954, 90 per cent of the total rent should be deposited to the railway and the rest 10 per cent is credited to the State Government.

The lands are to be surveyed and leased out. The work of leasing out has not yet been completed.

Khas Mahal Lands.

The Waste Land Reclamation Section has reclaimed 209 acres of Government *Khas Mahal* lands out of which 102 acres have been settled with members of the Scheduled Castes and Tribes.

ANIMAL HUSBANDRY DEPARTMENT.

The District Animal Husbandry Officer, Dhanbad with his headquarters at Dhanbad is in charge of the Animal Husbandry Department in the district. He is under the administrative control of the Deputy Director of Animal Husbandry, Ranchi and the Director of Animal Husbandry with his headquarters at Patna. The District Animal Husbandry Officer is assisted by Subdivisional Animal Husbandry Officers who are posted at Dhanbad, and a Live Stock Inspector and a Fodder Overseer.

In Blocks the District Animal Husbandry Officer is assisted by his Veterinary and Animal Husbandry Supervisors. The Animal Husbandry Supervisor at the Block has some assistants.

DISTRICT WELFARE OFFICE.

The District Welfare Officer with his headquarters at Dhanbad works under the Deputy Commissioner. There is an Assistant Welfare Officer, with headquarters at Dhanbad, to assist the District Welfare Officer. Besides, a Welfare Inspector has been posted in each Block for the welfare work in it. The Secretary of the Welfare Department is the administrative head of the Welfare Department.

The Welfare Department is to implement the various welfare programmes covered in the First, Second and Third Five-Year Plans for the uplift of the people such as establishment of grain *golas*, construction of schools, hostels, residential buildings, sinking of wells for the Harijans, etc.

LABOUR OFFICE.

The Labour Superintendent with his headquarters at Dhanbad is under the direct control of the Divisional Assistant Labour Commissioner with his headquarters at Jamshedpur. There are two Labour Officers one is in charge of Labour and Conciliation and the other is in charge of Labour and Inspection, both posted at Dhanbad. There are three Labour Inspectors, two of them posted at Dhanbad and one at Chas. They assist the Labour Officer and the Inspecting Officers in their work.

The main duties of the Labour Officer are to promote harmonious relations and to act as Liaison Officer between the workers and the managements, to get the grievances and complaints of workers with regard to their working conditions redressed, to bring the breaches of labour laws, orders and statutory obligations concerning the health, safety and welfare of the workers to the notice of the manager or the occupier, and to take suitable steps for the provision of amenities such as canteens, shelters, latrine facilities and drinking water, etc., by the management.

DISTRICT PANCHAYAT OFFICE.

The District Panchayat Officer with his headquarters at Dhanbad is under the control of the Deputy Commissioner. At the divisional level the Regional Deputy Director is the administrative head with his headquarters at Ranchi and at the State level the Director of *Gram Panchayat* is the administrative head with his headquarters at Patna.

There are five *Gram Panchayat* Supervisors with their headquarters at Dhanbad Sadar, Nirsa, Gobindpur, Topchanchi and Chas.

Till the end of 1961, the *Gram Panchayat* Department has been able to form 203 *Gram Panchayats* covering the total area of the district. Out of 203 Notified *Gram Panchayats* fresh election has been completed in 70 *Panchayats* and 70 *Gram Kachaharies* have also been established. In these Notified *Gram Panchayats* 203 *Gram Sewaks* have been appointed. The *Gram Sewaks* already appointed have been posted in the *Panchayats*.

NON-OFFICIAL CONGRESS PANCHAYATS.

During the years of the last Great War and thereafter within the sub-district of Dhanbad (now a district) about 800 non-official *Panchayats* of different kinds were formed under the auspices of the then Dhanbad Subdivisional Congress.

There is an interesting history behind the formation of such *Panchayats*.

During the last Great War and thereafter people suffered greatly for short supply and mal-distribution of the essential commodities for which the then Government introduced the Rationing system for distribution of the essential commodities. During this period most of the Congress workers were put in Jail owing to 1942 movement. Towards the end of 1944 and beginning of 1945 the Congress workers were released from Jail. When Shri P. C. Bose, the President of the Dhanbad Sub-district (now District) Congress Committee (later M. P.) came out of the Jail, he was approached by the people mostly from the villages and complained about non-supply of the essential commodities, to them and in their areas for a pretty long time due to short supply and mostly due to mal-distribution. Shri P. C. Bose had consultation with the then Additional Deputy Commissioner, Shri A. B. Powell, Dhanbad about proper distribution and offered distribution through non-official Congress *Panchayats* in every nook and corner of Dhanbad sub-district.

After proper enquiry Shri A. B. Powell, I.C.S., welcomed the idea and agreed to recognise the Congress *Panchayats* for the purpose.

Thereafter a meeting of the Sub-district Congress Committee and important persons of the sub-district (now district) was called. On 17th October 1946 the Congress Working Committee formed a Subdivisional Panchayat Committee for Dhanbad sub-district of 27 members with Shri P. C. Bose as its President. A sub-committee was also formed for drafting a Constitution which was drafted and duly adopted on 24th November 1946 (and amended on 25th February 1947). The Constitution was translated into Hindi and Bengali, printed and circulated throughout the district of Dhanbad.

The aim and object with which the *Panchayats* were formed as will appear from the Constitution were to (a) ensure supply and equitable distribution of essential commodities, (b) improve sanitation and condition of villages in all aspects including cultivation, education, road, removal of social evils and untouchabilities, (c) to encourage village industries, spinning and weaving, (d) to form defence committees, (e) to decide petty matters and (f) to do everything for furtherance of the object with which the *Panchayats* are formed.

In pursuance with rules framed under the Constitution village *Panchayats*, ward *Panchayats*, *Anchal Panchayats* (Group *Panchayats*), Industrial Area Village *Panchayats*, Town and *Thana Panchayats* were formed throughout the sub-district area under the supervision of the Dhanbad Sub-district Congress Committee and under the immediate supervision of the Dhanbad Subdivisional *Panchayats*. In every corner of the district the people were expected to manage

their own affairs and take part in equitable distribution of the essential commodities under the control of both the Congress Committee and the Government. There was complete co-operation with the administration.

When *Panchayats* under the Government Panchayat Raj Act came to be formed the non-official Congress *Panchayats* merged in the Government *Panchayats*, as almost the same set of people in most cases were elected for the Government *Panchayats*.

It may be noted that these non-official Congress *Panchayats* also received every co-operation from the Government at all times whether it was the British or our national Government.

STATE EXCISE—OLD HISTORY.*

The study of the old records shows that excise engaged a good deal of attention in 1860. It appears that the administration had an eye to the big revenue derived from excise; but at the same time did not want the poor people impoverished themselves. The retail vendor could purchase *gunjah* at 12 annas per seer and sell the same for Rs. 4. This left a very big margin to a retail vendor. The duty was increased from Re. 1 to Rs. 2 per seer and this has resulted in a salutary decrease of the consumption of *gunjah*. The soil of Manbhum which included Dhanbad did not encourage the cultivation of *gunjah*.

It appears that the excise shops particularly on the Grand Trunk Road used to be closed down when European Troops would pass by. The idea was not to encourage the European troops to indulge in country spirits. Sri Ambika Charan Mukerjee, Abkaree Deputy Collector had sent an annual statement for 1861-62 to the Deputy Commissioner. From his letter no. 73, dated the 6th May, 1862 it appears that the statement on 1st May, 1860-61 was Rs. 31,044-0-2 and the collection made during the year 1861-62 amounted to Rs. 35,660-1-6 exclusive of Rs. 5,592 being the sale-proceeds of opium and Rs. 62-12-0 on account of miscellaneous collections. From 1st May, 1861 to 30th April 1862, collections made on account of income-tax amounted to Rs. 337-5-2 and all charges incurred for this purpose did not exceed Rs. 3,452-3-7.

2. The sale of opium in comparison with some previous years increased because of the suppression of the sale of contraband opium.

3. The settled Abkaree Revenue up to the 30th April, exhibited a demand of Rs. 7,833-10-10 over the estimate of past year and Rs. 8,377-4-10 over the average *Jumma* of 3 preceding years.

* As some old records gave some interesting facts of the Excise Department they have been briefly mentioned here. (P. C. R. C.).

4. A deficit was found in the quantity sold during the year under report, when compared with the quantity consumed in 1858-59 during which period the tax on *gunjah* was not doubled; but the demand for the drug might increase as at the beginning of the year 1861-62 shops of *gunjah* were seven in number whereas at its close there were 31 shops on the list.

The same Abkaree Deputy Collector, as some of the old correspondence shows, discouraged a considerable increase in price of *gunjah* as that would have caused smuggling of *gunjah* from the neighbouring district of Hazaribagh and consuming *dhatoora*, *nux-vomica* or *khochila*. Spirit shops were used to be regularly inspected.

There were two distilleries at Purulia and Raghoonathpore which started functioning from 1st May, 1864 and thereby a number of outstills were closed down. *Mahua* used to be commonly brewed. The other type of intoxicants like *puchai*, *churus*, *bharg*, *majum*, *chamdaum* were not in use as the annual report of the Abkaree Deputy Collector on 6th May, 1862 shows. The intoxicants used were *tari*, *gunjah*, *abkaree* opium and *muddut*.

PRESENT STATE EXCISE DEPARTMENT.

There is now an Excise Superintendent for this district as the head of the administration at the district level. He is under the immediate control of the Deputy Commissioner, Dhanbad. The Superintendent of Excise is also under the administrative control of the Commissioner of Excise, Bihar with his headquarters at Patna.

The district of Dhanbad is divided into two ranges, namely, Dhanbad Sadar and Baghmara under the charge of one Inspector with headquarters at Dhanbad. These two ranges have been further divided into eight circles, namely, Dhanbad, Chirkunda, Govindpur, Jharia and Sindri in Sadar range and Katras, Baghmara and Chas in Baghmara range. Each circle is under the charge of one Sub-Inspector.

There are only two warehouses in the district which are located at Dhanbad and Chas. There is also a *ganja* and *bharg gola* in Dhanbad. Dhanbad warehouse is under the charge of one Sub-Inspector whereas the Excise Sub-Inspector in charge of Chas circle supervises the work of Chas warehouse. There is a special centre at Topchanchi.

The district has one mobile force for the detection of excise cases. Its jurisdiction extends over the whole of Dhanbad district. One Inspector is in charge of the force with his headquarters at, Dhanbad.

There is one Sub-Inspector attached to the Court for conducting excise cases. One Sub-Inspector is attached to Dhanbad special. During 1961-62 about 5 mds. of Nepali *ganja* was seized.

The consumption of foreign liquor is confined only to the richer class of the people and does not hamper the sale of the country spirit. The greater portion of the excise revenue is derived from the taxes levied on country spirit, *pachwai*, *ganja* and foreign liquor.

The consumption of opium has been sought to be restricted by the prohibition of free sale of opium. Opium is sold now for medicinal purposes only to those persons who hold a permit from a proper medical authority that consumption of opium is a necessity for medicinal purposes.

There are also certain restrictions against consumption of country liquor in the shops. But these measures have had very little effect and the incidence of consumption of intoxicants has been definitely going up. During summer months a large number of toddy shops crop up. Toddy (*tari*) as a beverage is very largely consumed throughout the district.

There is no prohibition in Dhanbad district. The State has not yet adopted prohibition as a policy. An attempt is made to bring the prohibition by the raising of the price of intoxicants through the increase of excise duty and imposing restriction against consumption of intoxicant in public places. For example unless there is a licence for a bar no one can bring a drink and have it at the shop.

The number of illicit distillation cases is very high in respect of other districts.

The following table will show the number of illicit distillation cases during 1956-57 to 1961-62:—

Year.				No. of illicit distillery liquor cases.
1956-57	..	..	..	2,300
1957-58	..	..	..	2,645
1958-59	..	..	..	2,638
1959-60	..	..	..	2,498
1960-61	..	..	..	2,608
1961-62	..	..	..	2,595

The following statement will show the revenue figures, consumption of country spirit, *ganja*, *bang*, and opium, etc.:-

Years.	Distillery Spirit.					Ganja.	
	No. of licences.	Consump- tion in L.P. gallons.	Licence fee.	Duty.	Total.	No. of licences.	Consumption.
1	2	3	4	5	6	7	8
			Rs.	Rs.	Rs.		M. s. ch.
1951-52	..	129	2,37,775.00	2,49,541	35,97,472	58	52 6 0
1952-53	..	129	1,87,874.00	5,14,296	32,05,507	58	42 3 2
1953-54	..	129	1,69,041.00	4,54,860	29,35,703	58	41 25 8
1954-55	..	129	1,60,446.90	4,48,882	28,49,536	58	96 10 0
1955-56	..	129	1,48,915.30	4,19,612	25,47,520	58	91 29 0
1956-57	..	40	1,17,543.80	2,80,238	23,54,783	25	91 14 0
1957-58	..	50	74,868.70	1,42,960	20,30,640	25	76 15 0
1958-59	..	53	90,463.30	1,63,519	22,96,919	25	82 7 0
1959-60	..	54	95,464.03	2,11,101	24,66,879	25	60 12 0
1960-61	..	54	87,148.10	2,69,848	23,72,901	25	71 25 0
1961-62	..	54	94,402.80	3,00,625	25,19,674	..	64 13 0

Years.	Ganga.					Bhang.				
	Licence fee.	Duty.	Total.	No. of licence.	Consumption.	Licence fee.	Duty.	Total.		
	9	10	11	12	13	14	15	16		
1951-52	..	36,706	3,65,214	4,01,920	21/38	92 7 0	31,486	64,714	Ra.	Ra.
1952-53	..	28,479	2,99,951	3,28,430	20/38	99 18 0	31,866	67,669	33,228	35,803
1953-54	..	27,215	2,91,464	3,18,679	20/38	89 30 0	27,283	60,215	32,932	32,932
1954-55	..	42,339	2,84,766	3,27,105	20/38	72 18 0	25,520	51,740	26,220	22,552
1955-56	..	37,358	2,74,416	3,11,774	21/38	60 28 0	19,685	42,318	17,169	34,029
1956-57	..	42,029	2,74,830	3,16,859	11	47 6 0	16,860	27,301	14,382	27,713
1957-58	..	35,961	2,28,954	2,64,915	11	39 14 0	12,919	26,108	15,129	13,816
1958-59	..	39,193	2,43,150	2,82,343	11	42 30 0	12,584	26,566	13,129	12,806
1959-60	..	39,573	2,40,417	2,79,990	11/5	37 7 0	12,292	22,699	12,806	12,806
1960-61	..	34,886	2,14,725	2,49,611	11/6	36 22 0	13,437			
1961-62	..	30,153	2,83,430	3,13,583	10/6	35 10 0	9,893			

Years.	Opium.					Foreign liquor.				
	No. of licence.	Consump- tion.	Licence fee.	Duty.	Total.	No. of licences.	Licence fee.	Duty.	Total.	
1	17	18	19	20	21	22	23	24	25	
		M. s. ch.	Ra.	Ra.	Ra.		Ra.	Ra.	Ra.	
1951-52	.. 18/30	3 21 8	8,230	60,845	64,075	36	72,463	1,286	73,749	
1952-53	.. 18/30	3 8 12	21,478	53,320	74,798	45	96,856	..	90,856	
1953-54	.. 18/30	3 18 0	23,852	57,190	81,042	45	87,171	..	87,171	
1954-55	.. 18/30	2 50 0	20,490	47,300	67,790	45	94,177	..	94,177	
1955-56	.. 19	2 1 8	16,184	35,045	51,229	45	78,471	..	78,471	
1956-57	.. 8	10 0 8	8,276	17,416	25,691	33	86,038	..	86,038	
1957-58	.. 8	0 15 8	8,136	6,865	8,801	33	1,06,693	120	1,06,813	
1958-59	.. 8	0 8 8	1,618	3,855	5,273	33	1,21,413	627	1,22,043	
1959-60	.. 1/8	0 3 8	746	1,505	2,251	34	1,38,826	529	1,39,355	
1960-61	.. 1/9	0 3 8	654	1,505	2,159	56	1,50,434	1,371	1,51,805	
1961-62	.. 1/10	0 3 0	562	1,290	1,852	56	1,63,924	4,568	1,68,512	

Years.	Commercial spirit.				Tari.			Pachani.			
	No. of licence.	Licence fee.	Duty.	Total.	No. of licence.	Licence fee.	No. of licence.	Licence fee.	Miscella- nous.	Total.	
1	26	27	28	29	30	31	32	33	34	35	
1951-52	..	99	7,202	173	7,375	13	40,060	58	6,54,521	1,76,065	53,28,492
1952-53	..	106	11,788	66	11,854	13	40,865	58	6,57,377	15,719	50,07,372
1953-54	..	106	10,045	22	10,067	13	45,559	58	6,91,465	16,002	47,00,763
1954-55	..	106	11,177	132	11,309	13	42,726	58	7,51,081	8,875	46,53,221
1955-56	..	106	9,238	85	9,323	13	47,533	58	8,74,977	9,568	43,92,324
1956-57	..	77	7,874	146	8,020	8	51,864	32	8,22,759	5,307	39,85,818
1957-58	..	77	9,644	358	10,002	8	45,278	32	7,66,943	3,629	34,28,283
1958-59	..	77	11,215	140	11,355	8	42,322	32	9,36,455	3,365	39,14,327
1959-60	..	86	11,457	592	12,039	8	49,202	32/10	10,96,221	3,979	42,67,125
1960-61	..	90	14,837	665	15,502	8	46,488	32/10	11,50,698	7,752	42,93,310
1961-62	..	90	14,026	13,720	27,746	8	45,267	32/18	11,39,330	2,838	45,42,129

SUB-REGIONAL EMPLOYMENT EXCHANGE.

This section as a department of Government of India was established in 1944 at Dhanbad.

In 1945 it was merged within the scheme of Director General of Resettlement and Employment and converted into Sub-Regional Employment Exchange with its jurisdiction over the districts of Manbhum, Hazaribagh, Santhal Parganas and sub-district of Dhanbad.

Since 1949-50 the District Employment Exchange has been functioning with two camp exchanges at Sindri and Kumardhubi.

A special Employment Exchange was opened in May, 1956 at Maithon to tackle the problem of the retrenched Damodar Valley Corporation employees from Maithon and Panchet Projects. Most of the persons had been provided with alternative employment with the joint effort of the Damodar Valley Corporation and National Employment Service in Bihar. The camp was started for a specific work and was closed down in 1956.

In Dhanbad district the Sub-Regional Office is functioning and its jurisdiction extends over Santhal Parganas, Hazaribagh and Dhanbad districts. The Sub-Regional Employment Officer is the administrative head at Dhanbad. There are six Assistant Employment Officers posted at Dhanbad proper, Jharia, Sindri and Kumardhubi in Dhanbad district.

The Directorate of Employment Exchange was under the Central Government till October, 1956 and there used to be a Sub-Regional Director at Patna at the State level who was also the Additional Secretary, Labour Department, Government of Bihar, Patna. From 1st November 1956 the entire organisation came under the administrative control of the State Government and it has now merged with the Department of Labour which has been renamed as Department of Labour and Employment, Government of Bihar, Patna. The State Director of the National Employment Service is the administrative head with his headquarters at Patna.

The chief function of Sub-Regional Employment Officer is to find employment for the unemployed. It is his duty to be in touch with different sources of employment and to make the Exchange popular. The unemployed irrespective of their age, educational qualifications, etc., are expected to register themselves indicating their preference for particular trade. The entries are categorised and whenever there is a demand from any employer the Exchange Officer sends the names of the possible candidates. The lacuna is in the fact that the employers seldom notify their requirements to the Exchange and there are far too many unqualified registered candidates looking for jobs of one and the same type. There is a dearth for technical men who seldom register them as they get a ready employment.

A statement is given below to show the number of applicants registered, placed and number of vacancies notified at the end of each year for ten years:—

Year.	No. of registration.	No. of applicants placed.	No. of vacancies notified.
1952	20,557	11,191	12,110
1953	16,289	2,498	4,124
1954	18,426	3,473	4,679
1955	21,182	3,579	4,847
1956	17,302	2,637	3,712
1957	15,801	Not available	4,049
1958	17,638	3,608	4,402
1959	17,343	3,397	5,182
1960	14,640	3,994	4,804
1961	18,548	4,341	7,355

The Employment Exchange (Compulsory Notification of Vacancies) Act, 1959 requires all the establishments in the public sector and those employing 25 or more in the private sector to notify to Employment Exchange vacancies covered by the Act in a prescribed form and also to render to the exchange a quarterly return. There appears to be some leakage in the implementation of this obligation. There has been no agency to check up if the vacancies are invariably notified.

ANTI-MALARIA DEPARTMENT.

The Anti-Malaria Department of Dhanbad district is one of the circles of Santhal Parganas district with its headquarters at Jamtara. The circle is under the charge of an Anti-Malaria Officer with his headquarters at Dhanbad. There are six Inspectors and 30 Superior Field workers under the guidance of Anti-Malaria Officer who is under the administrative control of the Chief Malaria Officer at Patna.

D.D.T. is largely used by the Malaria Department. It has brought almost a desired effect to a very great extent. More details will be found in the text on "Medical and Public Health Services".

INDUSTRY DEPARTMENT.

The District Industries Officer, Dhanbad with his headquarters at Dhanbad is under the control of the Deputy Commissioner, Dhanbad. There are two Inspectors of Industries posted at Dhanbad. Besides, there are eight Industrial Extension Supervisors posted at various Community Development Blocks of this district. The main function of this department is to give help to industries in general and to the

small-scale and village industries in particular. The Industries Officers are also to be of use in the general industrialisation of the district.

A number of Training-cum-Production Centres have been started where the trainees are given monthly stipends.

These centres which are located in different Blocks of the district are mentioned below:—

Name of the Training-cum-Production Centres.	Places and Blocks where located.
1. Wooden Toy Making Centre.	At Nirsa in Nirsa Block.
2. Ladies Tailoring Centre ..	At Dumarkunda in Nirsa Block.
3. Silk Weaving Tuitional Class.	Gobindpur.
4. Male Tailoring Centre ..	Gobindpur and Bhuli.
5. Calico Printing Centre ..	Topchanchi.
6. Leather Centre ..	Chandankiary and Dhanbad.
7. Blacksmithy Centre ..	Mukunda in Balliapur Block.

The Training-cum-Production Centres are shifted from one place to another in different Blocks of the district according to a phased programme so that benefits are distributed.

MEDICAL DEPARTMENT.

The entire organisation of Medical and Public Health at district level may be divided into two parts, namely, medical organisation and public health organisation. The former is headed by the Civil Surgeon and the latter by the District Medical Officer of Health. The functions of both the officers are different, although in certain matters the District Medical Officer of Health is to act in consultation with the Civil Surgeon.

The Civil Surgeon, who is a member of the State Medical Service, is the Superintendent of all the hospitals and dispensaries in the district maintained by the District Board or the Government. He exercises complete professional control over the Medical Officers in the hospitals and dispensaries.

There has been a slight change in the organisational side of the medical and public health units. This change has aimed at the amalgamation of medical and public health functions at the district level. A Government Circular no. IIA3-1-43 of 1958-189, dated the 3rd January, 1959, mentioned that the posts of Civil Surgeons in the district were converted into posts of Senior Executive Medical Officers and Civil Surgeons with the result that in this district the

Senior Executive Medical Officer is responsible for the efficient implementation, supervision and control of all public health measures, preventive as well as curative.

The Senior Executive Medical Officer is assisted by Deputy Superintendent, Sadar Hospital, three Medical Officers and one Lady Doctor at Dhanbad Sadar Hospital. Besides, there are thirteen State dispensaries and each is under the charge of one Medical Officer.

REGISTRATION DEPARTMENT—OLD HISTORY.

Records of registration of documents from the year 1850 were available in the Sadar Record Room of Manbhum district and had been cursorily looked into. Dhanbad (also spelt Dhanbaid earlier) and previous to that Gobindpur was a part of Manbhum and a number of these old records refer to the present Dhanbad district as well. The history of an area is not a mere narration of the political events. The registration of assurances throw some light on the prosperity or adversity of the common man which is as much a part of history.

These records are classified mainly under two heads, viz., records to be preserved permanently and records to be preserved for 50 years only. The former relates to land and other instruments like will, authority to adopt, bonds, agreements or contracts, etc., and the latter relates to records of thumb-impressions and records of power-of-attorney.

From the old records it appears that the registration of documents used to be held with sanctity. The actual hours of presentation of the documents and the completion of registration of the documents and the examination of the attesting witnesses on solemn affirmation bear testimony to this fact. This sanctity imposed on registration probably imbibes its origin to the act of *sampradan* (giving away) of *kanya* (daughter), *bhumi* (land) and *go* (cow) traceable from the Vedic age. The system of *sampradan*, the *mantras* of which are recorded denoting the *titli*, *paksha*, month, etc., and the particulars of the donor with his *gotra*, etc., was followed to a great extent in the registration of the old assurances. This sense of sanctity is presumably due to the fact that '*bhumi*' (land) is the symbol of *matrika* (i.e., mother). With the development of the society the custodianship of these assurances from the *nripati* (the king) and his representative the *Brahmin* (priest) came to the *badsha* and the *quazi* in the Mohammadan period and to the East India Company and the Judges appointed under the Company.

From these old records it appears that since the enactment of Act XXXVI on the registration of documents in 1793 till the year 1860, the 'Judges' in the districts of Birbhum, Bankura, Howrah, etc., in the *Suba* of Bengal-Bihar and Orissa and the 'Principal Assistant Commissioner' in this district functioned as the Registrar of Deeds. From 1861 to 1862 this was the function of the Judge

officiating as Registrar of Deeds in other districts and of the First Class Deputy Commissioner in this district. From 1863 to 1865 the Deputy Commissioner of Manbhum was the Registrar of Deeds. After the enforcement of Act XVI of 1864 the Deputy Commissioner as the Registrar of Deed had under him from 1865 some officers designated as Sub-Registrars.

About 300 original *ammokhtarnamas* (i.e., power of attorney), some original duplicates of deeds of conveyance and gift relating to the years 1857 to 1864 were in safe custody in the Record Room. Since 1865 copies of registered deeds appeared to have been systematically preserved. The above original documents of 1857 to 1864 are all written on hand-made papers in Bengali and all endorsements in English. The certificates as regards stamp duty and the registration fees paid appear in the records from 1866. In 1862 the spelling appears as 'Purulia'. The previous records shew its spelling as 'Poorooleah'. The total number of documents registered during these years appears to be between four to five hundred in the year till 1866. Most of the documents registered during these years appear to be *ijara*, deeds of sale, bond and mortgages. The small number of registrations testifies to the fact that registration had no bearing on the economic conditions of the people. The people did not have much necessity to part with their lands and the common man was happy. The reasons for this may be attributed to (a) cheap and simple living, (b) non-use of natural resources, (c) rich outturn of lands due to natural drainage and fertility of the soil.

The later socio-economic changes and the marginal utility of land rendered registration as an important economic factor.

Registration of assurances reflected, in a way, the socio-economic changes and slowly became the index of rural economy. The documents conveyed the throbs of the simple villagers. They mostly depended on these lands and they only under unavoidable circumstances transferred or alienated these lands to meet their bare or common needs or any extra need. In the old records excepting the documents of lease granted by the *zamindars* to the *raiya*s (which stopped due to the abolition of *zamindari*), a very negligible percentage of the total registrations would come under registration at 'will' only. The failure of crop, viz., paddy and lac the principal agricultural products, a slump in coal industry, any epidemic, freak of nature and high prices of the bare necessities of life have often contributed to the increase in registration. The figures in Table 'A' cover the figures of Manbhum district including Dhanbad from 1935 to 1951. The figures could not be separated from Dhanbad district but, nevertheless, have their relevancy. They give the total number of registrations in the district and the receipts from registration and other fees, expenditure over the maintenance of the registration establishment and other allied charges and the surplus and the prices of foodgrains, viz., rice, pulses, *mahua*, lac, salt, wheat and

coal. These are actual prices obtained from the body of the registrations and the local markets and are systematically maintained in the note books of the Registering Officers. Table "B" will show the percentage of sale, mortgage, lease and others. It will be seen that the incidence of registration has gone up tremendously. From an average of 18 thousand during 1935 to 1938 it went up to an average of 47 thousand during 1950-51 and also 1952. It will be noticed how the increase in registration has run parallel to the increase in rates of prices of foodgrains and other bare necessities. Some other agencies were also partly responsible for this increase. These are : The introduction of the Chotanagpur Tenancy Amendment Act, 1938 and its further amendment in 1948. The enforcement of the Bihar Money-lenders Act in 1938 and its subsequent amendment in 1945 helped to increase the percentage of sale against a decrease in the percentage of mortgages. The abrupt increase in registration in 1943 was due to the famine in the district for a total failure of crop.

It is significant that the Sub-Registry Office at Gobindpur was established as early as in 1865 and had preceded the office at Manbazar (1872), Raghunathpur (1876), Barabazar (1880) and Jhalda (1899)—places now in Purulia district of West Bengal. The Sub-Registry Office at Chas was opened in 1898 but this was abolished in 1926. The Sub-Registry Office was opened at Dhanbad in 1908 when the office at Gobindpur was abolished. These facts are mentioned here to show how the reaction of the common people was indicated in the opening of the offices for the registration of assurances.

TABLE "A"

Year.	Total no. of registra- tion.	Total receipts for regis- tration and other fees.	Seers per rupee.					Price per maund.				
			Rice.	Dal.	Oil.	Wheat.	Salt.	Coal.	Mahua.	Lao.		
1	2	3	4	5	6	7	8	9	10	11	12	13
			Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.
1935	..	18,596	49,944	23,615	26,329	..	..	..	..	..	..	..
1936	..	20,575	49,894	24,209	25,685	15	7½	2	8½	3 0	0 5	1 2
1937	..	16,852	47,916	25,278	22,638	15	7½	2	8½	3 0	0 5	1 4
1938	..	15,575	42,205	22,625	19,580	14½	7	2	9	3 4	0 5	1 0
1939	..	26,466	54,953	24,860	30,093	11	7	2	8	3 8	0 4	1 4
1940	..	32,258	62,049	25,299	36,750	10½	7	2½	7	4 0	0 4	1 4
1941	..	35,989	65,882	26,326	39,554	7½	7	2	7½	5 7	0 6	1 8
1942	..	38,878	78,616	25,485	53,133	6½	5½	1½	5½	8 0	1 0	2 4
1943	..	59,836	1,14,975	34,327	80,648	2½	2	1½	2½	6 0	1 0	4 8
1944	..	41,574	1,21,870	35,477	86,493	3	2½	½	2½	6 8	1 4	6 0
1945	..	40,855	1,40,050	44,175	96,034	3	2½	½	2½	6 8	1 4	6 0
1946	..	42,491	1,54,711	52,543	1,02,168	2½	2½	½	2	8 0	1 3	7 0
1947	..	40,096	1,53,732	49,604	1,04,129	2½	2½	1-6	2½	8 0	1 4	10 0
1948	..	42,119	1,73,406	54,123	1,19,283	2½	1½	½	1½	8 0	1 7	7 8
1949	..	39,237	3,20,013	62,993	1,57,020	2-6	1½	7 ch.	1½	8 0	1 9	8 8
1950	..	48,370	2,49,341	66,772	1,82,567	1½	1-6	6 ch.	1½	8 0	1 10	9 12
1951	..	47,631	2,56,414	76,268	1,80,006	2	1-12	8 ch.	1½	5 0	1 9	11 0

"The figures are for Manthum district including Dhanbad (P.C.R.C.)

TABLE "B".

*Percentage of different transactions**

Year.	Percentage of sale.	Mortgage.	Loan.	Others.
1936	12	18	40	24
1937	13	17	47	23
1938	14	13	49	24
1939	40	16	32	12
1940	47	10	20	17
1941	48	18	24	10
1942	47	18	23	12
1943	49	18	23	10
1944	44	18	28	10
1945	46	19	29	7
1946	43	20	28	9
1947	40	20	32	8
1948	41	20	33	6
1949	44	24	29	3
1950	47	26	23	4
1951	60	23	23	4

PRESENT REGISTRATION DEPARTMENT.

The Indian Registration Act of 1908, the Indian Stamp Act of 1899 and other allied Acts are in force in the Registration Offices.

The Sadar Sub-Registrar, Dhanbad is the departmental head of the Registration Department under the immediate administrative control of the District Registrar, i.e., Deputy Commissioner of Dhanbad. The Inspector-General of Registration, Patna is the head of the department. There is no sub-registry subordinate office in the district.

The Sub-Registrar deals with the registration of documents within his jurisdiction.

* Refers to the district of Manbhum including Dhanbad. (P. C. R. C.)

The Sadar Sub-Registrar assists the Deputy Commissioner in supervising the work of the Sub-Registry Office in the district. The Sadar Sub-Registrar's Office at the headquarters of the district has got a big record room where there are many old registers and indices. Registers and books contain copies of documents registered since 1800 A.D. Strict secrecy with regard to the contents copied in the register books is maintained as in doing so it yields good income to the Government in the shape of searching and copying fees.

The statistics below would show the number of documents registered, receipts and expenditure of the district from 1950 to 1961:—

Year.	Documents registered.	Receipt in rupees.	Expenditure in rupees.
1950	12,465	73,630	12,932
1951	12,741	74,576	12,687
1952	13,745	76,996	14,775
1953	13,325	77,416	14,482
1954	11,058	59,642	13,609
1955	11,676	62,119	14,668
1956	12,081	74,961	14,111
1957	14,023	87,496	23,299
1958	18,410	1,09,482	87,436
1959	17,231	1,12,501	21,652
1960	15,799	1,28,975	21,682
1961	16,187	1,24,869	22,837

The Chotanagpur Tenancy Act, 1938 has a bearing in the registration of the documents under various changes from time to time. The landlord's registration fee had increased by leaps and bounds since the introduction of the Chotanagpur Tenancy Act of 1938. The rise and fall in the number of registration of documents is a good index for the economic trends of the district.

The Money-lender's Act came into force since 1938, authorising the Registering Officer to grant licenses. The total number of licenses issued to the money-lenders is 379 during 1960-61.

The District Sub-Registrar is the Marriage Officer under the Special Marriage Act, 1954.

By notification no. A/K3-104/56-R-1343, dated the 18th June, 1956, issued by the Government of Bihar, Revenue Department (Registration Section) and by an amendment passed by the Parliament, the system of mentioning caste in the body of the documents has been abolished. All the Registering Officers are required by an order of Government to pass an examination in the tribal languages.

The Officers of the Registration Department are recruited by the Bihar Public Service Commission after passing the competitive examination and they are confirmed in their appointment after passing the departmental examination. Under Government Orders the Officer of the department are eligible for appointment as Honorary Magistrates and Deputy Collectors. The Sub-Registrars may also be employed in connection with other duties with the permission of the District Registrar subject to the order of the Deputy Commissioner.

DISTRICT MINING OFFICE.

The department was created in 1952. The District Mining Officer with his headquarters at Dhanbad is the administrative head of the department. He is under the Control of Director of Mines and Geology with his headquarters at Patna.

The main function of the department is to realise rent and royalty from the mines vested under the State of Bihar in accordance with the provision of Bihar Land Reforms Act, 1950.

Secondly, the department settles the free area relating to minerals with party.

Leases are generally granted for a period of thirty years in case of Schedule A Mineral, viz. (coal, iron-ore, etc.), and for a period of twenty years in case of minerals other than mentioned in Schedule A.

The statement below shows the realisation of rent and royalty from 1957-58 to 1961-62:—

Year.	Collection in rupees.
1957-58	7,96,817.88
1958-59	6,86,234.89
1959-60	76,893.99
1960-61	13,13,121.15
1961-62	16,21,350.58

Secondly, 568 leases have been granted by the ex-landlords of the district and six leases have been granted by the State Government from 1957-58 to 1961-62. Besides, two prospecting licenses have been granted during the year 1960. Prospecting license is granted for a period of one year or two years. This is only to prospect the area in order to know whether mineral exists in the area or not.

FOREST DEPARTMENT.

The Forest Department of Manbhum Division was created in 1946 consisting of the entire Manbhum district. In November, 1956, it was shifted to Dhanbad with jurisdiction over entire Dhanbad district. The department is under the administrative control of one Divisional Forest Officer, who is in charge of the Afforestation Division also. He is under the direct control of the Conservator of Forests with his headquarters at Hazaribagh.

There are three ranges located at Topchanchi, Tundi and Chas. Each Forest Range is manned by a Forest Ranger. A Forest Range in turn is composed of several beats each of which is in charge of a Forester. There are 11 beats in the district. Under a beat there are a number of sub-beats manned by Forest Guards. In this district there are 55 sub-beats.

The details regarding revenue derived from Forest Department have been given in the section "Forests" of "Agriculture and Irrigation" chapter, Dhanbad.

INSPECTOR OF FACTORIES OFFICE.

The office was established in 1955 at Dhanbad. The Inspector of Factories is the administrative head of the office. He is under the administrative control of Chief Inspector of Factories, with his headquarters at Ranchi, who in his turn, is controlled by the Labour Commissioner with his headquarters at Patna. About 571 factories are registered under Bihar Factories Act, 1948 employing 30,435 persons.

The organisational pattern of the following departments have been discussed in the chapter 'Law, Order and Justice', Dhanbad. They are listed below:—

- (1) Police Department.
- (2) Jail Department.
- (3) Anti-corruption.
- (4) Radio and Wireless Stations.

UNIFIED MINOR IRRIGATION DEPARTMENT.

Minor Irrigation Schemes include *bundhs*, tanks and *ahars* as well as repairs to old minor irrigation works. These minor irrigation works were carried out by three agencies, one under the Revenue Department, the second by Agriculture Department and the third by the Community Development Department. To avoid overlapping, the unified minor irrigation section has been set up which looks after all schemes. This agency was created in January, 1960 under one Executive Engineer. He is under the administrative control of Deputy Commissioner, Dhanbad and the Chief Engineer, Unified Minor Irrigation with headquarters at Patna.

DISTRICT ELECTION OFFICE.

This is one of the Deputy Commissioner's offices. This department was established in 1948 when Dhanbad was a sub-district. For the purpose of election, this office was treated as a district level department. In 1956 it was established in a full fledged manner. The District Election Officer is the head of this department. He is assisted by the two Election Supervisors who are in charge of Sadar and Baghmara subdivisions. For administrative control the District Election Officer is under the Chief Election Officer, Patna.

STAMPS.

This is another Deputy Commissioner's secretariat. The Treasury Officer is the head of this department. There is no Sub-Treasury Office in the district because there is State Bank of India at Dhanbad where money transactions are carried out.

The statement below supplied by Treasury Office, Dhanbad will give the receipts from the sale of stamps:—

Years.		Non-judicial in rupees.	Judicial in rupees.
1956-57	..	9,09,093	2,98,655
1957-58	..	10,11,552	3,00,733
1958-59	..	Not available	Not available.
1959-60	..	17,31,691.24	3,56,937.79
1960-61	..	15,25,023.47	3,76,296.72
1961-62	..	16,69,849.00	4,10,678.05

SUPPLY AND COMMERCE DEPARTMENT.

The Supply and Commerce Department at district level was created in 1956. The District Supply Officer with headquarters at Dhanbad is in charge of the district and is under the administrative control of the Deputy Commissioner, Dhanbad.

The District Supply Officer is assisted by two Assistant Supply Officers in the two subdivisions of the district under the administrative control of the respective Subdivisional Officers. Besides, there are eight Supply Inspectors in the district at different points, i.e., in urban and rural areas to supervise the fair distribution of cement, coal and other controlled commodities. The main function of the department is to enforce the control orders and to look to the proper distribution of essential commodities particularly under Government control amongst the consumers.

WEIGHTS AND MEASURES.

The District Inspector of Weights and Measures is the administrative head of the department. He is under the administrative control of the Deputy Commissioner, Dhanbad and the Divisional Inspector of Weights and Measures with headquarters at Ranchi who in his turn is under the Chief Inspector of Weights and Measures with headquarters at Patna. The District Inspector is assisted by two Subdivisional Inspectors posted at Sadar and Baghmara subdivisions with headquarters at Dhanbad. Their duty is to verify the weights and weighing instruments used for trade purposes. They have to visit the markets, *hats*, mines and factories and seize unauthorised weights and seers and insist on proper weights and measures being used and to sponsor prosecutions, if necessary.

**DIRECTORATE OF PROJECT LANDS AND REHABILITATION,
DHANBAD.**

During the Third Five-Year Plan a number of heavy industries are being established in the Chotanagpur Division. The Heavy Engineering Corporation have been entrusted with the responsibility of establishment of three large units near Ranchi, namely, the Heavy Machine Building Plant, the Foundry Forged Plant and the Heavy Machines Tools Plant. The State Government's own High Tension Insulator Project is also located at Ranchi. A large Steel Plant is proposed to be set up in Bokaro area. A number of medium and small industries are bound to develop round about this Steel Plant for the supply of refractories and other consumable stores to the Steel Plant as also the manufacture of small components, spare parts, etc., required by the Steel Plant. The Government of India have issued a licence to the Tatas to set up an Alloy and Tool Steel Plant in Adityapur area. The Atomic Energy Commission of the Government of India have decided to undertake mining of uranium ores in the district of Singhbhum and also to set up a factory near Ghatshila for the processing of ores. The Indian Copper Corporation have been given a licence by the Government of India to undertake manufacture of electrolytic copper. The Hindustan Steel, Ltd., and the National Coal Development Corporation have decided to set up a number of coal washeries in the Bokaro-Chandrapura-Dugda-Kargali belt for washing inferior grades of coal so as to make them suitable for use in the Steel Plants and other heavy industries. The largest Thermal Power Station of the State is being set up at Patratu.

These developments are bound to create new problems in the field of land acquisition, rehabilitation of families to be displaced by acquisition of land for these heavy industries, town and country planning, co-ordination in the various private sector companies as also between the various departments of State Government and liaison work with the host of private entrepreneurs who are anxious to set up ancillary industries in the Ranchi-Bokaro and Adityapur areas. A temporary post of Director, Project Lands and Rehabilitation, for Chotanagpur Division was created in 1962 with headquarters at Dhanbad to work under the Commissioner of Chotanagpur and devote his time and energy to the following duties:—

- (1) He will be responsible for acquisition of land in Hazaribagh and Dhanbad districts for the Bokaro Steel Plant and associated industries and rehabilitation of families to be displaced by such acquisition.
- (2) He will exercise supervision over the continuing rehabilitation problems and land acquisition operations for the Heavy Engineering Projects near Ranchi.
- (3) He will also deal with land acquisition and rehabilitation problems of Ramgarh-Patratu Plateau where the

Thermal Power Station is under construction and where an industrial area is being developed.

- (4) He will exercise general supervision over the land acquisition and rehabilitation work appertaining to Adityapur area.

It was felt that the preparatory stages of the Bokaro Steel Project would be difficult and, therefore, it was decided that the Director, Project Lands and Rehabilitation, would devote his entire time exclusively to the problems of Bokaro Steel Project and he should not be entrusted with work regarding Ranchi-Adityapur and Patratu areas for the time being.

The Director has two wings under him, viz., Land Acquisition Section and Rehabilitation Section.

For the Land Acquisition Section which is under the administrative control of Revenue Department of the State Government, the Director has one Special Land Acquisition Officer, three Additional Land Acquisition Officers and an Assistant Engineer.

For the Rehabilitation Section which is under the Industries Department of the State Government, he has one Deputy Director and three Assistant Directors.

The work done so far is as follows:—

Land Acquisition Section.—The lands to be acquired in connection with the Bokaro Steel Project are covered by three different notifications issued in the years 1956, 1961 and 1962. The field work in respect of all the villages notified is almost complete excepting a few villages. The Government orders under section 7 of the Land Acquisition Act have also been obtained in case of most of the villages covered by 1956 notification. In the case of notified villages in 1961 the Government orders under section 7 are pending for want of execution of agreement by the Hindustan Steel, Limited. In case of villages the rate reports have also been finalised and sent to the State Government for according sanction. The rate reports of the rest will also be finalised quickly.

The statement showing the details of the total number of villages and total acreage to be acquired, for the fourth Steel Plant to be sited at Marafari, P.-S. Chas (although called Bokaro Steel Plant) is as follows:—

District.	No. of villages.		Area.
1956 Notification.			
			Acres.
1. Dhanbad	19	(3 part)	14,520.32
2. Hazaribagh	25	(5 part)	29,623.59
Total	44	(8 part)	44,143.91

District.	No. of villages.		Area.
	1961 Notification.		Acres.
1. Dhanbad	18	(4 part)	14,569.68
2. Hazaribagh	11	(2 part)	6,457.14
Total	29	(6 part)	21,026.82
1962 Notification.			
1. Dhanbad	1		89.00
1962 Notification (Rehabilitation).			
1. Dhanbad	10		641.92
Grand Total			65,901.65

N.B.—The above figures do not include the acreage to be notified and acquired for the construction of Garga Dam Reservoir by the Hindustan Steel, Limited and construction of Marshalling Yard by the Railway authorities.

Scheme of Rehabilitation.—An outline of Rehabilitation Scheme has been submitted to the Government for their approval which is awaited. Displaced persons have been defined as a person whose lands are being acquired in connection with the establishment of Bokaro Steel Plant, or a person dependent on him, and who by virtue of such acquisition gets displaced from his place of residence. A person having no residence in the area under acquisition will not be treated as displaced. The Rehabilitation Scheme envisages a survey of the displaced persons with the following objects:—

- (1) Classification of each individual family as regards their means of livelihood and lands owned by them in the villages under acquisition or elsewhere.
- (2) Registration of every able bodied male member of families thereof for registration to enable him to seek employment in the Bokaro Steel Project on a preferential basis.
- (3) Ascertaining the wishes of the family as to their requirements of rehabilitation.
- (4) Provision of community facilities or common amenities.

Rehabilitation sites have been tentatively selected at villages Chas, Kandra, Khamarbendi, Bhawanipur, Jamgoria, Gopidih, Durgapur, Nischintpur, Badhadih, Badro, Adamdih, Alkusa, Dhandawar, Gopalpur, Bhuiyadwarika, Bamundwarika, Kumri, Partand, Chakulia, Jogidih and Dewanganj in Dhanbad district and some villages in Hazaribagh district. Some of these villages have been notified vide under section 4(1) of the Land Acquisition Act

and action is being taken to get other villages also similarly notified. Action is being taken to file requisitions for acquisition of private lands in these villages. The question of transfer of forest lands to the extent of about 1,000 acres is also under consideration. Government lands in compact blocks are not available and hence the necessity of acquisition of private lands and transfer of forest lands is realised.

The Rehabilitation Scheme provides that every family would be given homestead land to the extent of double the existing plinth areas of their houses subject to a minimum of 5 decimals and maximum of 1.5 acres. A scale for allotment of land has been recommended. The displaced persons will have to pay for the lands allotted to them. It has been recommended that the price charged should be at a rate including solatium which he got as compensation for acquisition of their homestead lands or actual cost of acquisition of the land for rehabilitation whichever is the lower. The rehabilitation scheme envisages provision of roads, schools, community halls, setting apart lands for temples, mosques, places of worship, cremation ground and grave-yards, wells (both *kachha* and *purca*) tanks and shops. These community facilities would be provided for by the State Government fully. In cases of temples, mosques, places of worship, cremation ground and grave-yards, the scheme envisages that these facilities would be provided out of compensation money paid for the existing units in the different villages and only extra fund will be provided by the State Government. Charges incurred on account of transporting families to the rehabilitation sites have also been provided. The shifting costs will form a part of the award under the Land Acquisition Act. Provision has also been made to help people in erection of temporary structures and a sum of Rs. 100 per family has been recommended. The scheme does not envisage construction of houses by the Directorate and it has been suggested that displaced persons should build their own houses. It has been recommended that loans may be given to the displaced persons under the Rural Housing Scheme and Low Income Group Housing Schemes. The scheme also envisages supply of building materials like G. C. sheets and asbestos sheets, cement, bamboos, *Salballahs*, etc., on payment. The scheme has also recommended help under Weavers' Housing Scheme. It has also been recommended that the lands given by the rehabilitation Directorate and houses constructed thereon should be treated as security for purposes of the loans and the condition of furnishing a non-encumbrance certificate may be dispensed with. It has also been recommended that the order of settlement of land by the Rehabilitation Directorate should be considered proof enough of the land belonging to the displaced persons.

The scheme also envisages that preference should be given to displaced persons for allotment of shops and for employment in the project.

It has been indicated by M/s. Hindustan Steel, Ltd., that they would not require lands notified in 1956 to the west of Chandra-pura-Muri Railway line. The present indications are that all villages notified in the year 1961 and some eight villages more which are required for the Garga Dam Reservoir would be required by the Bokaro Steel Project. About 3,000 acres of land will be required for the Railway Marshalling Yard. According to present indications 37 villages of Dhanbad district and 25 villages of Hazaribagh district would be acquired for the Bokaro Project. The site for the Marshalling Yard is yet to be indicated by M/s. Hindustan Steel, Ltd. According to the present indications M/s. Hindustan Steel, Ltd., would require 42,500 acres of land inclusive of 3,000 acres of land required for the Marshalling Yard. There are 8,559 families with 50,795 population in these villages which are likely to be affected. These figures, of course, do not include any population likely to be displaced by acquisition of land for the Marshalling Yard.

As the broad outline of the rehabilitation scheme has not yet been approved by Government, detailed villagewise schemes have not been prepared. The present indication suggests about 6,000 acres of land as required for rehabilitation of displaced persons.

Bihar Restriction of Uses of Land Act.

This Directorate also exercises the functions of the District Magistrate under the Bihar Restriction of Uses of Land Act, 1948. So far draft notifications have been issued in respect of 31 villages of Hazaribagh district and 19 villages of Dhanbad district. Notifications actually declaring these villages as controlled areas are expected to be issued shortly.

CENTRAL GOVERNMENT DEPARTMENTS.

Chief Mining Adviser Office.

Established in 1936 as Mines Adviser Office, the name was changed in 1958 to "Chief Mining Adviser Office".

There are two branches of this office, viz., 'Mining Branch' and the other 'Loco Coal Procurement and Inspection Branch'.

The Chief Mining Adviser is the administrative head of the office. The office is now attached to the Ministry of Labour and Employment in Government of India. The Chief Mining Adviser has under him one Mining Adviser, one Assistant Mining Adviser, four Senior Inspectors of Loco Coal and ten Junior Inspecting Officers posted at Dhanbad.

The main function of Mining Section is to see the proper implementation of the statutory obligations regarding safety of the railway track and loading accommodation to the collieries all over India, etc.

The main function of Loco Coal Section is (1) procurement of coal on contract from different collieries for the use of locomotives

and industries of All-India Railways; (2) distribution of coal procured to the different railways as to the requirements of each railway; (3) to inspect whether proper coal is being loaded by the collieries on loco account and to rectify where necessary and (4) to study the reports of bad coal complained by the different railways and take remedial measures to stop recurrence of future loading of bad coal.

Divisional Superintendent Office (Railways), Dhanbad.

Dhanbad Transportation Division was set up in 1946 with Dhanbad as headquarters. The Divisional Superintendent (Transportation) was made directly responsible to the General Manager through the Heads of Departments for all transportation work in Dhanbad area including co-ordination of the working of the Transportation Department with other departments, and he has been delegated with powers of a Divisional Superintendent in all matters relating to operation and establishment in Dhanbad area.

Dhanbad Transportation Division consists of—

- (1) Grand Chord—Pradhankhanta Railway Station to Manpur Railway Station.
- (2) Coal areas in Dhanbad district.
- (3) Barkakana loop—Gomoh to Barwadih including Patratu-Damodar branch serving Karanpura National Development Corporation Coalfields.

Dhanbad Transportation Division covers 345 route miles with 61 stations, 13 block huts, one flag station, seven loco sheds and two control offices.

The Divisional Superintendent is the administrative head of the office. He is assisted by the following set of officers of the Division:—

- (1) Divisional Operating Superintendent (Transportation).
- (2) Divisional Operating Superintendent (General).
- (3) Divisional Mechanical Engineer (Power).
- (4) Divisional Mechanical Engineer (Construction and Works).
- (5) Divisional Superintendent of Tele-communication-Engineering.
- (6) Coal Area Superintendent.
- (7) Two Assistant Operating Superintendents (Transportation).
- (8) One Assistant Operating Superintendent (General).
- (9) Divisional Mechanical Engineer (Planning).
- (10) Assistant Coal Area Superintendent.
- (11) Assistant Mechanical Engineer (Planning).
- (12) Assistant Electrical Engineer.

In order to have a better co-ordination in the work of the division, a full fledged divisional organisation is now being set up at Dhanbad which will have one Divisional Personnel Officer, one Divisional Accounts Officer, one Divisional Commercial Superintendent and one Divisional Superintendent for Tele-communication-Engineers. Of these, only Divisional Superintendent of Tele-communications-Engineering has been posted at Dhanbad and the rest are still in Asansol in West Bengal.

Bokaro Steel Project Office.

It was established in 1961 at Dhanbad. This is a Central Government undertaking. There is one Land and Estate Officer of Additional District Magistrate's rank. Below him there are one Assistant Land and Estate Officer and one Assistant Settlement Officer.

The main function of the department is to expedite the land acquisition work and liaison work with the State Department.

Under notification no. 9059-R, dated 10th August, 1956, the target for acquisition of lands was 14,529.32 acres in Chas police-station in Dhanbad district.

There is also a proposal under notification no. 9505-R, dated 4th September, 1961, to acquire more land in addition to 1956 notification.

At present (1962) the project has constructed a guest house in village Harla and also an air-strip in an area of 221.19 acres of land in Chas police-station. The work is at an initial stage and lands are being acquired for the different purposes.

Central Excise.

This is a Central Government Department established in 1943 at Dhanbad. The Deputy Superintendent is the administrative head of the department at district level. The immediate controlling officer of the Deputy Superintendent of Central Excise at Dhanbad is the Superintendent of Central Excise with headquarters at Ranchi. The Superintendent is under the administrative control of Assistant Collector of Central Excise with headquarters at Ranchi. He, in his turn, is controlled by the Collector of Central Excise with his headquarters at Patna.

There are two ranges in the district, viz., Dhanbad and Sindri. There are five Inspectors and two Sub-Inspectors of Central Excise. Three Inspectors are posted at Dhanbad and two at Sindri. The Sub-Inspectors are posted at Dhanbad.

The chief function of the department is to look after the proper collection of excise duty levied by the Central Government from time to time.

The statement supplied by Central Excise Department, Dhanbad will show the Excise Revenue realisation from the district during 1959-60 to 1961-62.

Name of commodities.	1957-58 in rupees.	1958-59 in rupees.	1959-60 in rupees.	1960-61 in rupees.	1961-62 in rupees.
1	2	3	4	5	6
1. Silver	26,831.89	20,273.20	27,436.21	29,335.74	38,335.88
2. Motor spirit	1,251.58	1,136.92	3,708.80	42,951.83	21,819.27
3. Paints	34,859.98	34,302.16	60,370.57	33,301.85	22,322.16
4. V.N.E. oil	57,328.92	73,427.90	80,591.02	78,036.83	6,889.17
5. Tobacco	11,26,528.60	9,26,767.47	8,28,307.00	7,99,614.81	7,59,005.85
6. Glass	Nil	Nil	Nil	4,139.00	2,20,482.13
7. Radio	Nil	Nil	Nil	Nil	94,457.80
8. Cement	Not available	58,59,268.00	67,17,153.00	61,82,832.00	64,37,124.20

Regional Labour Commissioner's Office.

The Chief Labour Commissioner at Delhi has under him two Deputy Chief Labour Commissioners, a Welfare Adviser, four Assistant Labour Commissioners and seven Regional Labour Commissioners at Bombay, Calcutta, Dhanbad, Manpur, Madras, Nagpur and Vishakhapatnam, 50 Conciliation Officers and 120 Labour Inspectors and 10 Junior Labour Inspectors.

The Regional Labour Commissioner at Dhanbad has under him five Conciliation Officers, four at Dhanbad and one at Hazaribagh. For the purpose of conducting inspection of Central undertakings, Railway establishments and many other Central sphere undertakings the Regional Labour Commissioner has 23 Labour Inspectors and four Junior Labour Inspectors.

The names of Central undertakings which are under the jurisdiction of Regional Labour Commissioner, Dhanbad are given below:—

- (a) 600 coal mines, (b) 590 mica mines, (c) 1,500 railway stations, (d) 300 Banks and Insurance Companies having branches in more than one station, Central Public Works Department Contractors' establishments, major ports and oil fields and civilian employees employed in different establishments.

The function of the department is given below:—

- (1) Collection of information regarding wages, rents and other conditions.
- (2) Administration of following labour laws and regulations:—
 - (1) Payment of Wages Act, 1936.
 - (2) Minimum Wages Act, 1948.
 - (3) Employment of Children Act, 1938.
 - (4) Industrial Disputes Act, 1947.
 - (5) Coal Mines Bonus Schemes Act, 1948.
 - (6) Hours of Employment Regulation.
 - (7) To carry out enquiry for the breach of code of discipline.
- (3) Enforcement of Awards of the Tribunals and Conciliation agreements.
- (4) Verification of the membership of the labour union affiliated to All-India Trade Union Organisation.

The function of the Central Industrial Relation Machinery is to secure industrial peace by persuasion and conciliation.

The institutions provided for prevention and settlement of industrial disputes are—

- (a) Works Committee consisting of the representatives of the employers and workmen,
- (b) Conciliation Officers,
- (c) Conciliation Boards and Courts of Enquiry,
- (d) Tribunal and Appellate Tribunal and National Tribunal.

To minimise disputes and difference arising between them and the administration the industrial relations have generally been satisfactory.

Department of Mines in India.

The headquarters of the Department of Mines in India is situated in Dhanbad. This department, which is responsible for the safe working of mines of all types and categories all over India, was formed in 1902 with a nucleus of officers drawn from the Geological Survey of India. The headquarters of the department was shifted to Dhanbad in 1908. The Chief Inspector of Mines is the administrative head of the department with his headquarters at Dhanbad. Below him, there are many officers, viz., Deputy Chief Inspector of Mines, Regional Inspectors and Inspectors. The department is now attached to the Ministry of Labour and Employment in Government of India, and is responsible for the administration of the Mines Act, 1952 which relates to the management and control of all types

of mines, ranging from stone, coal, etc., to gold and diamonds and for securing the safety, health and welfare of persons employed therein. It also enforces the Coal Mines Regulations, 1957, the Metalliferous Mines Regulations, 1961, the Mines Rules, 1955, the Coal Mines Rescue Rules, 1959, Mines Creche Rules, 1959, Pithead and Bath Rules, 1959, etc., in respect of all the mines in India. This department is the oldest Mining Department of the Government of India and till the formation of Stowing Board, the Coal Board, the Indian Bureau of Mines, etc., it acted as the technical adviser to the Government of India on all matters concerning the development of mineral industry in India.

The officers of the Department of Mines, besides carrying out routine periodical inspection of mines, investigate into all fatal and the important serious accidents, and into cases of explosions, inundations, fires, collapses, break downs, etc., in mines. In case of such emergencies, they have often to take over control of the operations in the mines affected.

Where mine workings become unstable, the Inspectorate insists upon the provision of necessary protective measures. In cases of danger of an urgent and immediate nature, the Inspectors of Mines have powers to prohibit the employment of persons in any mine or part thereof.

The Inspectorate also lays down the conditions of work beneath roads, rivers, reservoirs and other important surface features, etc., for multi-section workings, and for the reduction or extraction of pillars and for stopping operations in mines.

The Department of Mines also renders advice to other departments of the Government of India, to the State Governments and to mine owners, etc., regarding the safe development of mineral industry. The Inspectorate is also intimately and officially connected (with its officers acting as Chairman or as Members) with several important organisations connected with the mineral industry of India, including the Coal Board, the Technical Advisory Committee, the Fuel Research Advisory Board, the Mining Research Advisory Board, the Coal Mines Labour Welfare Advisory Board, the various State Mining Boards, etc.

The Department of Mines is also responsible for managing the various examinations held under the Mines Act, 1952 for the grant of Certificates of Competency for Mine Managers and Surveyors and for other Mine officials. Having, therefore, a vital interest in the subject of mining education in the country, the department is intimately connected with the various mining educational bodies, with the Chief Inspector of Mines acting as the President of the Executive Committee of the Indian School of Mines and as the Vice-Chairman of its Advisory Committee and also as the President

of the Joint Mining Education Advisory Board of Bihar and West Bengal. The Deputy Chief Inspector is the Chairman of the Coal Mines Rescue Station Committee and also the Chief Executive Officer for managing all mines rescue stations in India.

The department has also about 60 officers of senior grade on its cadre. Its work is organised in ten Regional Offices situated at various centres of mining activity all over India. Specialist staff of the department consists of a Medical Inspectorate, an Electrical Inspectorate and a Mechanical Inspectorate, etc. Other staff at the headquarters is divided in several sections, such as surveying, statistical management, law, etc.

The Department of Mines publishes the monthly *Coal Bulletin* and the annual *Indian Coal Statistics* (containing statistics about employment, earnings, production, accidents, mechanisation, etc., relating to all coal mines in India), Periodical lists of Coal Mines and of Metalliferous Mines containing names and addresses of mines of all types all over India and their owners, and the situation of these mines, an annual report about the working of Mineral Industry in India and various other types of brochures.

Income-Tax Department.

Income-tax is a Central subject. There are two circles, viz., Territorial and Colliery Circle. Both the circles are divided into two wards, i.e., Ward 'A' and Ward 'B'. There are four Income-Tax Officers, who are the administrative heads of each Ward.

Jurisdiction.

(1) *Territorial Circle.*—The Income-Tax Officer of Ward 'A' of Territorial Circle holds jurisdiction over Dhanbad Municipality, Jharia Mines Board of Health and Sindri. The jurisdiction of Ward 'B' of Territorial Circle extends to the rest of the whole of Dhanbad district.

(2) *Colliery Circle.*—The Income-Tax Officers of Colliery Circle extends over the entire district of Dhanbad dealing with colliery cases. The Income-Tax Officer of Ward 'A' of colliery circle extends over jurisdiction of Baghmara subdivision and the Income-Tax Officer of Ward 'B' holds the jurisdiction over entire Sadar subdivision excluding the cases of Ward 'A'.

In 1962 there were three Inspectors, one attached to Ward 'A' and the other attached to Ward 'B' and the third is attached with Colliery Circle with their headquarters at Dhanbad to assist the officers in their enquiry work.

The Controlling Officer of the Income-Tax Officers at Dhanbad is the Inspecting Assistant Commissioner of Income-Tax, Southern Range, with his headquarters at Ranchi. He in his turn, is under the Commissioner of Income-Tax, with his headquarters at Patna whose jurisdiction extends over the whole of Bihar and Orissa Provinces.

For Wealth Tax purpose, in which income is also included, the Income-Tax Officer, with his headquarters at Dhanbad is himself the authority and he is controlled by the Commissioner of Income-Tax.

The figures relating to Wealth Tax are not available in the department.

For Estate Duty case including the Income-Tax, the Assistant Controller of Estate Duty-cum-Income-Tax with his headquarters at Ranchi is the controlling authority. He is under the administrative control of the Deputy Collector of Estate Duty, Calcutta Range, with his headquarters at Calcutta. The figures of Estate Duty are not available in the department.

Regarding the appeals from the orders of the Income-Tax Officers, they lie with the Appellate Assistant Commissioner of Income-Tax with his headquarters at Ranchi. He comes to the district headquarters to hear the appeals.

Statement of assessment and collection of Income-Tax along with the number of assesseees of both the circles supplied by Income Tax Department, Dhanbad, is given below for the last five years:—

Years.	No. of Assesseees.	Gross demand in rupees.	Net collection in rupees.
1957-58	.. 5,082	56,04,000	37,43,000
1958-59	.. 5,375	57,03,000	35,62,000
1959-60	.. 5,246	59,02,000	39,84,000
1960-61	.. 5,632	57,72,000	40,37,000
1961-62	.. 5,303	50,72,000	29,75,000

Life Insurance Corporation.

After nationalisation of Life Insurance work the Life Insurance Corporation, India was set up and the Dhanbad branch was started in September, 1956. The Branch Office at Dhanbad has two development centres at Katras and Chirkunda and there is a Sub-office at Sindri under Jamshedpur Division. The Sindri Sub-office was started in March, 1959 and the Katras and Chirkunda Development Centres in 1961 and 1962 respectively. The Sindri Sub-office has been functioning as a Branch office directly under Jamshedpur Division. There is an Assistant Branch Manager (Development) at Sindri. The Katras and Chirkunda Development Centres are under Dhanbad Branch with an Assistant Branch Manager (Development). There are 33 Field Officers in Dhanbad Branch out of which 21 are directly under the Branch and six each are under Katras and Chirkunda Development Centres. Out of 21 Field Officers put under the Branch direct, six are posted at Jharia, one at Jorapokhar, one at Jogta, one at Kenduadih and 12 at Dhanbad proper. Out of 12 Field Officers placed under the Development centres, one is posted

at Baghmara, five at Katras, two at Nirsa, one at Maithon and three at Chirkunda. There are six Field Officers in the Sindri Sub-office of which all are posted at Sindri proper. The Field Officers who have a specified area in their charge work through appointed village agents. These village agents work on commission basis calculated on the premiums paid on policies.

Postal Department.

The Postal Department including Telegraphs and Telephones is under the Central Government. There is one Superintendent of Post Offices with his headquarters at Dhanbad. He is directly under the control of the Post Master General, Bihar with his headquarters at Patna. The Superintendent of Post Offices is in the overall charge of the postal services in the district.

The jurisdiction of the Superintendent roughly extends over the whole of the district of Dhanbad. For administrative purposes and for running the service efficiently the entire Dhanbad Postal Division is subdivided into one subdivision, namely, Dhanbad subdivision. The subdivision is under an Inspector of the rank of junior selection grade of the Postal Service. The headquarters of the Inspector is at Dhanbad.

The Dhanbad Post Office is the head post office. There are two types of sub-post offices, i.e., departmental and extra-departmental. The strength of the departmental sub-post offices is 40 and that of extra-departmental is two. In extra-departmental sub-post office part-time clerks are appointed where they get Rs. 75 per mensem. There are 89 branch post-offices. The majority of the sub-post offices are served direct by rail communication with railway mail service and a few are served by roads through mail runners.

The branch post offices are located at bigger villages.

Central Mining Research Station Office.

This office was established in 1955 at Dhanbad. This is a research institution dealing with safety and efficiency in mining. The office is attached to the Ministry of Scientific Research and Cultural Affairs in Government of India. There is a Director who is the administrative head of the office. The officers subordinate to him are as follows:—

- (1) Deputy Director—1.
- (2) Assistant Directors—3.
- (3) Senior Scientific Officers, Grade I—9.
- (4) Senior Scientific Officers, Grade II—9.
- (5) Administrative Officer, Grade II—1.
- (6) Junior Scientific Officers—15.

The details regarding Central Mining Research Station has been discussed in "Education and Culture" chapter, Dhanbad.

CHAPTER X.

LAW, ORDER AND JUSTICE.

INCIDENCE OF CRIME.

Dhanbad district has Santhal Parganas to the north, the district of Burdwan in West Bengal to the east, the Purulia district in West Bengal to the south and the district of Hazaribagh to the west.

The statistics of crimes recorded in the police *thanas* and the number of heinous crimes so recorded indicate the crime position of the district to a great extent. It is true that many crimes may not be reported or even reported crimes are not properly categorised or their nature may be minimised. Thus a case of dacoity may be minimised to be a case of theft or a theft as a non-cognizable mischief. It is also a common complaint that many reported cases are not recorded properly as a crime but a mere station diary entry is made. In spite of the possibility of some leakages, these recorded statistics do give us a fairly good index of the crime position.

The following two tables show the incidence of crimes under different heads in the district:—

TABLE 1.
Crime Statistics.
Crimes under different heads from 1947 to 1961.

Year.	Murder.	Dacoity.	Robbory.	Burglary.	Theft.	Riot.
1	2	3	4	5	6	7
1947	14	43	20	303	746	37
1948	9	39	24	670	838	49
1949	11	63	31	672	707	50
1950	14	49	33	639	735	34
1951	12	59	30	598	697	38
1952	30	35	55	643	814	30
1953	15	49	26	756	783	66
1954	24	50	52	818	833	90
1955	31	61	43	752	855	152
1956	19	46	38	799	1,217	..
1957	25	49	49	681	881	97
1958	28	44	54	722	1,224	64
1959	30	20	40	603	862	66
1960	28	19	28	485	919	45
1961	33	26	31	575	900	79

TABLE 2.

Total cognizable crimes from 1955 to 1961 reported to Police only.

Year.	Cases.	Charge-sheeted.	Convicted.	Acquitted.	Compounded.	Pending.
1	2	3	4	5	6	7
1955	2,562	550	265	197	88	..
1956	2,793	575	291	181	67	36
1957	2,714	784	333	264	83	104
1958	2,749	876	370	203	77	226
1959	2,507	724	241	120	24	339
1960	2,235	456	81	18	33	324
1961	2,460	510	155	71	23	261

While studying the present crime position of this district it has to be kept in view that two *thanas*, namely, Chas and Chandankhari with a total area of 321 square miles and population 1,68,144 were added to this district in 1956 as per recommendations of the States Reorganisation Commission.

It would appear from the above table that in spite of the fact that two *thanas* were added to this district there was a great improvement in the crime position of the district in 1959. This might have been due to uninterrupted administration of one particular Superintendent of Police, Mr. N. N. Singh. There was decrease under all heads of crime excepting under the head murder. Murder, however, cannot be prevented. It may be noted that out of 36 cases of murder in 1959 only in four cases the motive for murder was found to be 'gain'. The reasons for committing murder are usually psychological and due to sudden provocation.

The figures of dacoity is the lowest in 1959 and was only 20 cases as against 44 in 1958 and 43 in 1947. It was 35 in 1952. The present figure has almost come down to its pre-war average figure which is 16.3. There has been over 50 per cent decrease over the figure of the year 1958. It may be noted that the highest number of dacoities in the district was 63 in 1949. The tempo of industrialisation has brought in a higher incidence of certain types of crime.

This district has an ever growing fluctuation in population with good roadways and railways. It is on the border of two districts of West Bengal. The trans-provincial Grand Trunk Road runs through this district. The various industries have attracted thousands of outsiders. There is a cross-section of people of all parts of India in this district. This is an advantage for the anti-social elements. Criminals hailing from Punjab, Uttar Pradesh, West Bengal and districts of Bihar, namely, Gaya, Patna, Shahabad and Monghyr have been found operating in this district. These criminals manage to get some sort of employment in the collieries or other industrial concerns under fictitious names and address and commit crimes whenever they get opportunity by mixing with local criminals.

It may be noted that 75 per cent of the criminals sent up during 1958 were found to be outsiders. Immediately after committing heinous crime, such criminals manage to go away to distant places because of good communications. By the time the police get the information and arrive at the scene the criminals may go far out beyond their reach. This diminishes the chances of detections.

The following steps had been adopted to keep down crime:—

- (1) Efficient patrolling and planned preventive measures specially in the two *thanas* like Nirsa and Baliapur where crime was ripe.
- (2) These two *thanas* were divided in different zones and placed in charge of different officers of and above the rank of Assistant Sub-Inspector. Six armed sections were provided in Baliapur during 1958. Above all these one police pick-up was also provided under Inspector, Sindri Circle who was made to camp at Baliapur. The system of providing pick-ups and a section of force in Baliapur is still continued. This measure has proved somewhat effective which will be apparent from the fact that eight cases were reported from Baliapur police-station. During 1958-59 this police-station reported only one case. There were detections and spot arrests in some cases at this police-station.

Similarly Nirsa police-station had reported 10 cases in 1958, but during 1959 it reported only 5 cases and one case ended in charge sheet.

- (3) Detection of gangs.

In Tundi police-station dacoities stopped after the arrest of Nepali Bhuian and his associates who had been charge-sheeted. This dacoity was reported in Tundi in the month of July and after July no case of dacoity was reported from this police-station.

Similarly in August, 1958 one dacoit was arrested at the spot in village Lakhipur of Chandankeari police-station. On the basis of his statement and the statement of his wife and parents, the entire gang members of notorious Rathu Layak of Purulia district were arrested and sent up for trial. As a result during 1959 the *thana* remained completely free from dacoities. The case had ended in conviction.

- (4) Successful prosecution of criminals sent up in dacoity cases of 1958.
- (5) Arrest of a large number of criminals of Baghmara, Katras, Topchanchi in Dumri police-station, case no. 11 (5)59, under section 395, I. P. C. who were also arrested in Jhinjhi Pahari dacoity case of Katras police-station, vide S. R. 39|59.
- (6) Arrest of a large number of criminals of Balia and Shahabad residing and employed in Central Fuel Research Institute, Dhanbad and various collieries within the district. These criminals were arrested near Baghmara in Nawadih police-station in Hazaribagh district, case no. 8, dated 14th July 1959, under section 395, I. P. C.
- (7) Successful prosecutions under section 110, Cr. P. C. (Bad livelihood cases). Veteran criminals whose names transpired in dacoity cases and who could not be sent up in specific cases for want of sufficient evidence were prosecuted under section 110, Cr. P. C. for bad livelihood. It may be noted that 17 veteran and selected criminals were sent up for prosecution under section 110, Cr. P. C. in 1959 and 16 in 1958. Notorious criminals like Mahadeo Mandal of Natangram police-station, Chirkunda, Hari Ram Tiwary of Baghmara subdivision and Panni Mahto of Govindpur police-station were prosecuted under section 110, Cr. P. C.

As regards the crime position in the district during 1961 it may be mentioned that it remained satisfactory although there was some increase under almost all heads excepting murder and road accidents, when compared to the statistics of the years 1959 and 1960.

There were only two cases of murder and four cases of highway robberies. A gang of highway robbers of Hazaribagh and Monghyr districts operating in Katras area was unearthed in October, 1960 and several members were arrested with stolen cycles and other articles.

*Also spelt as Chandankeary (P. C. R. C.).

There was no case of communal riot of any serious nature and there was no case of mail robbery. There was marked improvement under road accidents and copper wire thefts.

The special feature of this year was that in large number of cases of all nature, charge-sheets were submitted by the police and several dacoit gangs sent up in the current and previous year, were convicted by the court including veteran dacoits, viz., Prabhu Chand Mahuri, Maina Rai and Janardan Singh of Gaya district.

In 1961 twenty-seven cases of dacoity were reported but charge-sheets were submitted in 33 per cent cases and in one case conviction had been achieved, while others were pending for trial. Five different gangs hailing from Gaya, Patna and Asansol sides, working in the coalfields under false names and addresses were unearthed.

Three cases of interceptions of dacoit gangs against twenty-six persons hailing from different places were registered during the year under section 399/402, I. P. C. In two cases fire-arms and cartridges were also recovered. One member of Prabhu Chand Mahuri's gang was convicted.

The month of August, 1961 was a difficult time for the district when five cases of dacoity were reported. But there was much improvement in the dacoity position after August, 1961 when the gang of Quimuddin Mian and Jamuna Singh of Asansol area was uncarthed and also remnants of the gang of Prabhu Chand Mahuri were arrested. Quimuddin had made a judicial confession. The areas lying on the border of Baliapur, Nirsa and Chirkunda were disturbed during the year. Several dacoits who were found active and could not be sent up in a specific case were sent up under section 110, Cr. P. C. Anti-dacoity team was also working in this district since August, 1961. Similarly Dhanbad town was very much affected with burglaries during July and August, but situation improved when some criminals of Calcutta were arrested.

The reason for improvement under copper wire theft was that there were a number of instances during the year when copper wire thieves were caught red handed either in cutting wires or with the stolen copper wires.

A number of road accidents were also reduced to appreciable extent due to constant vigil and simultaneous checking of vehicles. An electric traffic signal had also been put up in 1961 at the junction of roads in front of Dhanbad Railway Station.

Economic development in this district is going on at a rapid pace due to widespread industrialisation in this coalfield. Side by side traffic is also increasing in greater proportion but not much has been done so far to improve the roads or to increase the road mileage. In order to make the roads fit to bear the ever increasing heavy load of traffic and to minimise the chances of road accidents it appears necessary to improve the important roads and to construct many more roads.

With the establishment of Hindustan Steel Plant a big portion of which lies in Chas police-station and of coming up current industrial and numerous establishments in this district a large number of motor vehicles have come up on the roads. Due to increase in the vehicles, the work of the Motor Vehicle Section of Dhanbad Police Office has also increased to a very great extent.

Robbery.—The figures under this head was also well under control. 40 cases were reported during 1959. There was one very interesting detection. It was a case of highway robbery in respect of a Taxi Car, in which two Punjabi criminals were concerned. The culprits were caught at Patna City along with the car, while they were busy in changing the colour of the taxi.

Burglaries.—In the case of burglaries also there has been a marked improvement. These have been reduced by more than 100 cases when compared to the figure of 1958. The present figure is the lowest since 1948. It is the same as 12 years back, i.e., in 1947, i.e., pre-Independence days, when such development schemes had not been imagined even. There was no case of mail robbery. Number of highway robbery was very few.

Theft.—The figure of theft is also on the decline. 862 cases were reported against previous 1,224.

Riot.—The position is rather static, but it may be noted that the number of serious rioting was very few.

Cognizable Crime.—Number of total cognizable crime has also gone down by about 400 cases. The figure of 1960 is the lowest since 1955. Although there is some improvement in crime position there is no room for complacence. With more of industrialisation and better communications there is a risk of crime being of more intelligent type.

ORGANISATION OF THE POLICE FORCE.

As regards the Police Administration in the district it may be mentioned that the sanctioned strength of the police force in 1961 was one Superintendent of Police, two Deputy Superintendents, one at headquarters, i.e., Dhanbad and another at Baghmara subdivision posted at Dhanbad, five Inspectors (one is temporary who is in charge of the Anti-smuggling Check Post), 38 permanent Sub-Inspectors, five temporary Sub-Inspectors, one Reserve Sub-Inspector, two temporary Sergeants, 46 permanent Assistant Sub-Inspectors, 18 temporary Assistant Sub-Inspectors, 701 constables which include 261 temporary constables, 136 armed permanent constables and 187 armed temporary constables (including *Anchal*) and 631 *Chaukidars*. It will work out that one constable is meant for 15,000 to 16,000 population.

The Police Administration of the district is headed by the Superintendent of Police with headquarters at Dhanbad.* He is under the administrative control of the Deputy Commissioner, Dhanbad, the Deputy Inspector-General with headquarters at Ranchi and the Inspector-General of Police at Patna. He is assisted by two Deputy Superintendents of Police who are in charge of Sadar and Baghmara subdivisions with headquarters at Dhanbad. Each of the two subdivisions has one Police Inspector.

The subdivisions are subdivided into smaller areas each of which is under a police-station. Police-station is defined in section 4 (s), Cr. P. C. and is the unit of investigation. For the purpose of Police Administration, all the investigating centres are known as police-stations. A police-station is generally manned by one Sub-Inspector, one Assistant Sub-Inspector, one Writer Constable and 10 constables. The average area of a police-station is about 150 square miles with a population of about 1,50,000 souls. Each police-station has a large number of villages under it and normally each of which is looked after by a *Chaukidar*. A large village will have more than one *Chaukidar*.

For the purpose of Police Administration, the district has been subdivided into four circles: (i) Dhanbad, (ii) Govindpur, (iii) Sindri and (iv) Katras circle. Each of these circles is under an Inspector of Police.

(1) Dhanbad circle has (a) Dhanbad, (b) Kenduadih and (c) Jogta police-stations.

(2) Govindpur circle has (a) Govindpur, (b) Tundi, (c) Nirsa and (d) Chirkunda police-stations.

(3) Sindri circle has (a) Sindri, (b) Jharia, (c) Jorapokhar and (d) Baliapur police-stations.

The above circles are under the jurisdiction of Dhanbad Sadar subdivision.

(4) Katras circle which is in Baghmara subdivision has the following police-stations under it: (a) Baghmara, (b) Topchanchi, (c) Chas, (d) Chandankeari and (e) Katras.

The towns in the district have town outposts, besides their police-stations. These town outposts are under the police-stations of their respective towns. Town outposts are established in towns or remote parts of *muffassil* police-stations for the purpose of patrolling and surveillance, and, generally for the prevention of crime. They are not investigating centres, and the officer-in-charge is usually

* Dhanbad was a separate unit as a police district even when it was a sub-district but the designation of the Police Chief was Additional Superintendent of Police. In November, 1956 when Dhanbad became a full-fledged district the designation was changed to that of a Superintendent of Police. The first full-fledged Superintendent of Police was Mr. N. N. Singh.

a Havildar, though responsible for the manning of the post, only performs the duties he would carry on if posted to the parent police-station subject in the same way to the control and direction of the Sub-Inspector.

Dhanbad police-station has three permanent outposts, namely, Dhanbad, Hirapur and Dhaiya. It has also two temporary outposts at Bhuli and Jagjiwan Nagar. Kenduadih police-station has one permanent outpost under it—Kenduadih. Putki police-station has two permanent outposts situated at Putki and Kurkani. Jogta police-station has one outpost situated at Jogta. Jharia has one permanent outpost situated at Jharia. Besides, Jorapokhar, Sindri, Chirkunda, Katras, Topchanchi, Chandankeari have one permanent outpost situated at Jorapokhar, Saharpura, Kumardhubi, Katras, Gomoh and Bhajudih respectively.

For the prosecution of the criminal cases in the Magistrates' courts there is one Senior District Prosecutor equivalent to the rank of a Deputy Superintendent of Police, posted at Dhanbad. He is helped by the Assistant District Prosecutors if necessary. The scheme of D. P. S. and A. D. P. S. was introduced in this district in 1956. An Assistant District Prosecutor is appointed from the rank of practising junior lawyers and also police officers with knowledge of law and experience of prosecution cases in courts.

To help the regular police force the following three categories of establishments have been established:—(1) *Anchal Force*, (2) Home Guards and (3) Village Resistance Group.

Anchal Force.

This force was raised in 1960 mainly for the purpose of guarding and escorting Government revenue entrusted to the Block Development Officers in different Community Development Centres. The strength of the force is likely to increase with the increase in the number of blocks. The unit for each *Anchal* consists of one Havildar and eight constables.

In 1961 the strength of this force was as follows:—

- (1) Quarter Master Sergeant—1.
- (2) Reserve Sub-Inspector—1.
- (3) Assistant Sub-Inspectors—2.
- (4) Jamadar—1.
- (5) Havildars—3
- (6) Constables including leave, touring and reserve—63.

Home Guards.

This force was organised in 1950 in Dhanbad district according to the Bihar Home Guards Act, 1947 (Bihar Act XX of 1947), with a view to help the administration in various aspects especially the

Police Department for patrolling and raising Village Resistance Groups in crime affected areas, prevention of crimes and maintenance of law and order. At present (1962) the strength of the force is as follows:—

- (1) Company Commanders—3.
- (2) Havildar Clerk—1.
- (3) Office Orderly—1.
- (4) Home Guard Volunteers—131.

The sanctioned strength of Home Guard Volunteers is 111 but due to the last general election 20 more Volunteers were appointed in emergency and they are continuing.

For the enrolment of any person as a Home Guard, the following qualifications are required:—

- (a) Age not less than 19 and not more than 40 years on the 1st day of January of the year.
- (b) A good moral character.
- (c) Physical fitness.
- (d) A height of not less than 5' — 4" and chest measurement not less than 31" (unexpanded).
- (e) A pass at least in the Upper Primary test or an equivalent examination.

Every Home Guard Volunteer shall after his enrolment undergo a course of training for a period of not more than three months which will comprise among other courses:—

Infantry drills including arms drills, musketry course, first-aid, fire-fighting, map reading, traffic and mob control and *lathi* drill.

The duty of every Home Guard is to assist in the maintenance of peace and tranquillity, to inculcate the habit of self-reliance and discipline and to develop a sense of civil responsibility amongst the citizens of the State and to assist the maintenance of essential services for which they are trained. The Home Guards may be required to perform all or any of the following duties:— (a) Prevention of commission of crimes, (b) protection of life and property, (c) assistance in the organisation and functioning of village guards, (d) collection and communication of intelligence concerning law and order to the immediate superiors, (e) suppression of disorders, (f) to report and check currency of rumours likely to disturb peace, (g) to assist fire-fighting services and (h) to render first-aid and help in the removal of casualties to hospitals.

During the period on which a Home Guard is on active service (excluding the period spent over training) or in the reserve forces, he shall receive duty allowance at the rate of Rs. 1-8-0 in addition

to ration in accordance with the scale per day. Provided that if the hours of duty is less than three hours a day, the Home Guard will draw a duty allowance of Re. 1 but no ration. During the period of training every Home Guard shall receive a free boarding and lodging, besides a training allowance of Rs. 30 a month.

Village Resistance Groups are parties raised in the villages, trained and armed by the police and they are meant to be so many local units to fight dacoity and other anti-social measures.

RADIO AND WIRELESS STATION.

There is one wireless station in the district at Dhanbad for receiving and transmitting information. At present (1962) the strength of the staff is as follows:—One Assistant Sub-Inspector of Police who is called Station Officer and three Writer Constables.

POLICE RESERVE.

The Police Reserve at the headquarters of the district is divided for the purpose of organisation into Ordinary Police Reserve and the Armed Police Reserve.

Ordinary Police Reserve is maintained to supply guards and escorts, to strengthen police-stations and outposts and in emergency to furnish parties to attend Magistrates' courts and to fill vacancies caused by leave and casualties. It remains under constant drill and instructions.

Armed Police Reserve is a part of the reserve and kept at headquarters in readiness for dealing with local disturbances. It is maintained in full strength. The strength of the Armed Police Reserve in the district is one Sergeant Major, four havildars and 50 constables. There is also an armed temporary reserve whose strength is as follows:—Havildars 6 and constables 92 including leave and training reserve. This force cannot be employed on miscellaneous duties or sent away from headquarters without the authority of the Deputy Commissioner or the Inspector-General of Police, but it may be called upon to furnish the magazine guard when there are unusual heavy demand on the ordinary reserve and there is no likelihood of the armed police being required for urgent duty elsewhere. If the Deputy Commissioner is absent and prompt action is needed, the Superintendent of Police can move the Armed Police Reserve on his own responsibility informing the Deputy Commissioner as quickly as possible.

Besides the normal police organisation as described, there is a confidential C. I. D. Section, a State Anti-Corruption Unit and the Railway Protection Staff.

Dhanbad is a very important district from crime point of view due to easy and quick communication and the large industrial units. The police force here is an expanding unit and is bound to be very much extended in the course of the next one decade.

POLICE INFORMATION ROOM.

A Police Information Room with a separate telephone is functioning at the district headquarters since 1952. It is centrally located in a room of the Police Office building and a section of Armed Force with a Police Truck has been provided for duty to afford protection in all cases of emergency in the areas of the following *thanas* of the district. Officers are also attached to this information room to attend these calls:—

- (1) Dhanbad police-station, (2) Jogta police-station, (3) Kenduadih police-station, (4) Katras police-station, (5) Jharia police-station, (6) Jorapokhar police-station, (7) Sindri police-station, (8) Gobindpur police-station.

ADVANCE TRAINING SCHOOL.

This school has been opened for Havildars and constables of this district. The aim of this course is to afford them a refresher course and to acquaint them with the scientific aids in the detection of crime.

DISTRICT INTELLIGENCE BUREAU.

The scheme of the creation of District Intelligence Bureau with Criminal Investigation Department staff posted in the district was approved and brought into effect from 1st April 1955. The Bureau has two branches, Political and Crime. The Crime Branch is known as "District Crime Office or District Crime Bureau" and the Political Branch deals with registration of foreigners particularly besides other duties. Under this scheme one Inspector with two Sub-Inspectors of Police and two writer constables are posted in the Crime Office. The Crime Branch maintains records of crimes and criminals. It helps the regular Police Force in investigation and detection of cases and crime control work.

MISSING SQUAD—TRAFFIC POLICE.

A missing persons squad is functioning in this district for assisting the public in tracing out missing boys and girls. The work has been entrusted to the District Crime Bureau. This squad also keeps an obtrusive watch over authorised and unauthorised children institution orphanages. With the advent of the street Romeos whose nefarious attention to the girls particularly going to the schools and colleges the work of the police has increased a lot. The duty of the traffic police has also enormously increased. The roads were never meant to be used by the vast array of vehicles and pedestrians. Street accidents have become common. Special training is given to the traffic constables. A motor cycle squad for stopping vehicles that have caused accidents has not yet been introduced.

CHOWKIDARI TRAINING SCHEME.

Village *Chowkidars* and members of the Village Resistance Groups are put to training. Archery has been introduced. They are

encouraged in their work by the award of cash prizes. As a crime preventive measure specially in dacoity case this scheme has been drawn up of a liberal grant of gun licences to the *Mukhias* of *Gram Panchayats* in the crime-affected area. But this may also become dangerous if the persons entrusted with guns are anti-social.

No Police Force can work successfully unless there is popular co-operation and a certain amount of civic consciousness to help the maintenance of law and order. It is a common complaint that there is not much of that civic consciousness and co-operation of the public.

GOVERNMENT RAILWAY POLICE.

The main function of the Railway Police is to check crimes on the railways, give security to the passengers and their properties.

There are three Government Railway police-stations in the district, one at Dhanbad, the second at Gomoh and the third at Barkakana Railway Stations. The Barkakana Government Railway Police lies within the district of Hazaribagh and half of the portion of Gomoh Government Railway Police falls within the jurisdiction of Hazaribagh district. Secondly, the Bhojudih Government Railway Police and the outpost of Bhaga which lie within Dhanbad district fall under the circle of Chakradharpur Station. The strength of the Dhanbad G. R. P. is two S.-Is., two A. S.-Is., one Writer Constable and twenty-eight constables. Its jurisdiction extends from Barakar to Tetulmari (Grand Chord Line) and Dhanbad to Chandrapura Railway Stations (Branch Line). The jurisdiction thus extends to about 60 running miles of the Eastern Railway.

The strength of Gomoh G. R. P.* Station is two S.-Is., two A. S.-Is., one Writer Constable and seventeen constables. The jurisdiction of Gomoh G. R. P. extends from Matari to Gujandih Railway Stations and Gomoh to Chandrapura Railway Stations. Its jurisdiction thus extends to about 111 running miles of Eastern Railway.

The strength of the Barkakana G. R. P. Station is one S.-I., one A.S.-I., and eight constables. The jurisdiction of the Barkakana G. R. P. extends from Phusro to Barwadih Railway Station which falls within the Gomoh-Dehri-On-Sone branch line and covers a distance of about 125 miles of Eastern Railway.

Recently (1962) special armed guards are posted in every important train during night time from Dhanbad to Asansol, Asansol to Gaya and back for the safety of the travellers and their properties.

In addition to this there is also one party named "Flying Squad" whose function is to escort the trains safely. The strength of the squad is one S.-I. and four constables posted at Dhanbad.

* G. R. P.—Government Railway Police.

All these Railway police-stations are under the Inspector of Railway Police posted at Dhanbad who is under the direct control of the Superintendent of Railway Police with his headquarters at Patna.

VILLAGE RESISTANCE GROUP.

The institution of Village Resistance Group was started in 1955 in the district and the groups are still being raised in crime-affected areas by local police in co-ordination with Village and Home Guard Volunteers. These groups are formed out of the public for the purpose of patrolling in anti-crime drives in the different police-stations. The villagers are being exhorted to organise themselves into a disciplined body and to enrol volunteers. In addition to this the *Panchayats* organise Village Volunteer Force in each *Panchayat*. They are also to act with the regular and rural police for the purpose of law and order and crime control measures. The total strength of the Village Resistance Groups in 1962 is 620 out of which only 320 groups are active and the rest are not functioning well but simply exist in the villages.

ANTI-CORRUPTION.

To eradicate corruption in the services, the State Government has sponsored an Anti-Corruption Department under the Political Department of the Government of Bihar with headquarters at Patna Secretariat. This department had a moving squad consisting of one Inspector, one Writer Constable and one constable who worked in Dhanbad district but in 1961 the section has been merged with the squad of Hazaribagh district and the squad of Hazaribagh controls the Anti-Corruption Department of this district. They work under the Deputy Superintendent, Anti-Corruption Department posted at Ranchi. The Deputy Secretary, Political Department (Anti-Corruption) controls the department. This department is quite separate from the District Police Organisation but has contacts when it is found necessary.

JAILS AND LOCK-UPS.

There is one District Jail of first class status at Dhanbad. It is located at about one mile north of Dhanbad Railway Station. The capacity of this jail is for 109 male and 11 female prisoners but remains congested with many more prisoners. For lack of accommodation, there is always heavy pressure of population and prisoners have to be frequently transferred to Hazaribagh Central Jail to relieve the pressure. One prisoners' barrack with eight blocks to accommodate 200 prisoners has been almost completed.

There is a whole-time Superintendent who has the assistance of a Jailor, two Assistant Jailors, a staff of warders and a doctor in charge of the jail hospital under whom there are also a compounder and one dresser.

Before 1956, this jail was functioning as a sub-jail under the charge of the Civil Assistant Surgeon of the Subdivisional Hospital who was also the part-time Superintendent of sub-jail. After merger of a portion of Manbhum district with West Bengal in 1956, Dhanbad was given the status of a district and the sub-jail was upgraded to the status of a District Jail.

The statement below shows the daily average population of Dhanbad District Jail for the last seven years:—

Year.	Male.	Female.	Total.
1955 ..	285.54	11.36	296.90
1956 ..	295.25	7.48	302.73
1957 ..	380.59	7.55	388.14
1958 ..	420.53	10.74	431.27
1959 ..	419.79	7.27	427.06
1960 ..	374.07	7.17	381.24
1961 ..	394.69	7.19	401.88

This jail has a garden of 9 acres out of which two acres contain lemon trees and two generally remain uncultivated while the rest is cultivated. There is a small dairy farm.

There has been a gradual abolition of corporal punishment and exaction of arduous work and prison discipline has become more and more a matter of intelligent and sympathetic understanding of the prisoners on the part of the jail staff and co-operation from the prisoners.

The convicted prisoners are trained in weaving cloth and *newar* and are engaged in such other work as bullock-driven oil presses and intensive vegetable gardening. The educated prisoners impart elementary education up to the Upper Primary standard to the illiterate prisoners. With the help of Education Department a Social Education Centre is running inside the jail. Some newspapers and other literature and occasional film shows are provided.

There are one Hindu and one Muslim religious instructor who give the prisoners religious discourses besides conducting prayers on every Sunday and Friday. The prisoners are allowed to celebrate important festivals.

With the enforcement of the Probation of Offenders Act, 1958, in the State and release of prisoners on parole there has been a far-reaching change. The word probation was used in the Criminal Procedure Code as far back as in 1898. It was provided therein that certain types of offenders committing trivial offences could be let off on probation of good conduct. The scope of this provision was extended with the amendment of Cr. P. C. in 1928. It was provided that the first offenders committing offences punishable with imprisonment for less than two years could be released on admonition. Suitable first offenders aged below 21 and woman when not liable to be punished either with death or transportation for life, and adult

males above 21 when not punishable with a term of imprisonment exceeding seven years could be released on probation of good conduct. No machinery was provided to the courts for ascertaining facts regarding the personality, character, social circumstances and prospect of rehabilitation of offenders in order to individualise punishment prior to the passing of Probation of Offenders Act, 1958.

After the enforcement of this Act in the latter part of 1959 in this district, there has been a change in the method of dealing with the offenders. To implement this scheme at present there is a Probation Officer posted at Dhanbad, who works under the Principal Probation Officer who is the Superintendent of Dhanbad District Jail.

The grant of probation in the circumstances is not a final disposal of the order to the offenders. The court merely suspends the infliction of punishment and subjects the offenders to a suitable process of trials. As stated above, an agency is provided to the courts where an offender can be supervised and treated through counselling and guidance while he is allowed to remain at large and assisted through the mobilisation of social assistance for him. Since the enforcement of the Act, 14 cases were received till March, 1962 from the court for pre-sentence enquiry report, out of which none of the cases were either dealt with under section 3 or 4 (1) and 4 (3) of the Act. During 1960, 31 cases were received from the court out of which five cases were released on admonition under section 3 of the Act, two cases were released under section 4 (1) of the Act and four cases were released under section 4 (3) of the Act. 13 cases were received for sociological enquiry from other institutions during 1961, 18 cases were received from the court out of which two of the cases were released on admonition under section 3 of the Act and four cases were released under section 4 (3) of the Act. Four cases for parole enquiry were received from other institutions during 1962 (April). 12 cases were received from the court out of which only one case was released on admonition under section 3 of the Act, one case for parole enquiry and three cases for sociological enquiry from other institutions had been received.

The salient features of the Probation of Offenders Act, 1958, are—

1. Courts have been given the power to place any offender on probation who is found guilty of having committed any offence not punishable with death or imprisonment of life provided, in the circumstances of the case, including the nature of the offence and the character of the offender, such a course is considered expedient by the court.
 - (i) Restrictions on the use of probation based on age, sex and previous conviction as contained in section 562, Cr. P. C. have been removed.

- (ii) The Act envisages a regular machinery for enquiring into the personality, character, antecedents and home surroundings of the offenders which is to assist the court in determining the most suitable method of dealing with them.
- (iii) It envisages a special machinery to supervise probationers as well as to advise and assist them while on probation, as well after discharge from the same.
- (iv) It envisages a release of an offender on various types of conditions including residential requirement and payment of compensation by him.
- (v) It makes probation enquiries mandatory in cases of offenders below 21 years of age where the provisions of the Act are applicable.

Juvenile prisoners, female prisoners and habitual offenders are kept separate from the prisoners of other categories.

Under-trial prisoners also are kept separate from the convicts. No work is taken from them except keeping their own personal equipments and wards clean. There is a Board of Visitors consisting of officials and non-officials for the jail.

ADMINISTRATION OF CRIMINAL JUSTICE.

On the creation of the Province of Orissa in the year 1936, the district of Sambalpur was attached to Orissa and the districts of Manbhum and Singhbhum remaining in Bihar were constituted into a separate judgeship styled as Manbhum-Singhbhum Judgeship. The Court of the District Judge of Manbhum-Singhbhum was required to hold its sitting at Purulia for disposal of business arising in the districts of Manbhum and Singhbhum and the Court of Sessions of the sessions division of Manbhum-Singhbhum was to hold its sitting at Purulia, Chaibasa, Dhanbad and Jamshedpur under Government notification no. 1958|J-21|36, dated 6th April, 1936.

In 1937 the districts of Manbhum and Singhbhum were formed into a new Subordinate Judgeship and the Subordinate Judge of Manbhum-Singhbhum was to sit at Purulia for the trial of cases arising in the district of Manbhum.

Again in exercise of the powers conferred by section 13, sub-section (i) of the Bengal, Agra and Assam Civil Courts Act (Act XI of 1887), the Lieutenant Governor in Council was pleased to establish with effect from the 31st October, 1917, a Subordinate Judge's Court at Dhanbad in the district of Manbhum, and to fix with effect from that date the local limits of the executive subdivision of Dhanbad as the local limits of his jurisdiction under notification no. 233-A.P., dated the 1st December, 1917 (published in the *Bihar and Orissa Gazette* of 1917, Part II).

It may be mentioned that before the creation of Judgeship of Dhanbad-Singhbhum, i.e., up to 31st October, 1956 Criminal Justice was administered by the Sessions Judge of Manbhum-Singhbhum assisted by the Additional Sessions Judge, the Deputy Commissioner, the Subordinate Judge, who was vested with powers under section 30 of the Cr. P. C. and with powers of Assistant Sessions Judge, the Subdivisional and other stipendiary Magistrates and by the Hony. Magistrates vested with powers of various classes. The Sessions Judge of Manbhum-Singhbhum used to come to Dhanbad from time to time on Circuit duty to do criminal business arising within the district in accordance with Government notification no. 53-A.P., dated 5th January, 1918. He also heard appeals from decisions of the Magistrate of First Class. The Deputy Commissioner heard appeals from decisions of the Second and Third Class Magistrates.

The headquarters of the Manbhum-Singhbhum Judgeship was shifted from Purulia to Dhanbad with effect from the 1st October, 1956 in accordance with the Government notification no. 5050-J, dated 26th September 1956 and the Courts of Munsifs and Sub-Judges at Purulia also were held at Dhanbad from the same date in accordance with Government notification no. 5049-J, dated 26th September 1956.

Again under Government notification nos. 584-J, and 585-J, dated the 25th January, 1960 the districts of Dhanbad and Singhbhum were constituted a separate Judgeship with their headquarters at Dhanbad and Chaibasa with effect from 4th February, 1960.

The staff entertained for the administration of Criminal Justice in the district of Dhanbad constituted of a Sessions Judge, Additional Sessions Judge, two Assistant Sessions Judges, Deputy Commissioner, Deputy Magistrates, Sub-Deputy Magistrates and Honorary Magistrates. The number of Magistrates at the district and subdivisional headquarters vary according to the need.

The following is the distribution of the Executive and Honorary Magistrates in Dhanbad district (1961):—

No. of Magistrates.		Powers.	Place of Posting
1.	8	First class	Dhanbad.
2.	4	Second "	"
3.	1 (Honorary)	Third "	"
4.	4 "	Second "	"
5.	1 "	Third "	"

Cases triable by the Court of Sessions are committed by the Magistrates to the Sessions Court. Sessions Judge and Additional Sessions Judge ordinarily try offences punishable with death and other sessions cases are tried by the Assistant Sessions Judges. The Assistant Sessions Judges hear appeals from the decisions of Second and Third Class Magistrates. There has been no official separation

of Executive and Judicial functions in this district but it is under the consideration of the State Government.

According to the Amendment Act 26 of 1955 in Cr. P. C., the Magistrate with first class powers can pass sentences for imprisonment either simple or rigorous for a term not exceeding two years and fine not exceeding two thousand rupees. The Magistrate with second class powers can pass sentences for imprisonment either simple or rigorous for a term not exceeding six months and fine not exceeding five hundred rupees. The Magistrate with third class powers can pass sentences for imprisonment either simple or rigorous for a term not exceeding one month and fine not exceeding one hundred rupees. The Court of any Magistrate may pass any lawful sentence, combining any of the sentences which is authorised by law to pass. They are under the administrative control of the Deputy Commissioner. The Magistrates of first class are empowered to hold preliminary enquiries in cases triable by the Court of Sessions and commit them to the Court of Sessions. They commit the accused persons to stand their trial in the Sessions Court after finding a *prima facie* case proved against them on evidence adduced and on perusal of documents produced before them. The original cases are heard and evidence taken by First Class Magistrate only and if a *prima facie* case is made out the accused persons are committed to the Court of Sessions to stand their trial there. Appeals from the decisions of Second and Third Class Magistrates are heard by the Deputy Commissioner or some other Magistrates specially empowered under section 407, Cr. P. C. to hear appeals. Appeals from the decisions of First Class Magistrates are heard by the Sessions and Additional Sessions Judges. The decisions of the Sessions Judge and Additional Sessions Judge can be taken up in appeal to the Patna High Court under section 410, Cr. F. C.

The Deputy Commissioner, Subdivisional Magistrates and Deputy Magistrates have the dual role of the administration of criminal justice besides their executive work. In his executive capacity a Magistrate has to maintain law and order and see to the prevention of breach of peace. In this dual capacity a Magistrate has to tour out of headquarters for days to run other administrative duties and be always ready for receiving and giving orders to meet the exigencies of administration.

As a Magistrate in his executive capacity an officer often comes to acquire extra-judicial information about a particular case and it is difficult for him to completely disabuse his mind of all that when he sits as a court to hold the scale of justice even. The dispensation of impartial justice is not always possible under the above system where the Deputy Commissioner, Subdivisional Magistrates and the Deputy Magistrates or Sub-Deputy Magistrates exercise executive as well as judicial functions, and are connected with police administration. Such officers are commonly taken to have a bias towards passing orders of conviction.

Broadly speaking there are two categories of criminal cases; one under the provisions of the Indian Penal Code and the other under Acts other than the Indian Penal Code, such as, Police Act, Indian Railways Act, Cattle Trespass Act, Cruelty to Animals Act, Factories Act, Payment of Wages Act, Motor Vehicles Act, Payment of Minimum Wages Act, Telegraph Wires (Unlawful Possession) Act, Bihar Sales Tax Act, Treasure Trove Act, Indian Boiler Act, Bengal Vaccination Act, Punitive and Preventive sections 144, 145, 107, 109, 110 of Cr. P. C., etc.

There are two types of cases, viz., cognizable and non-cognizable. Cognizable cases are those which are taken cognizance of by the police or by the Magistrate specially empowered under section 190, sub-section (2) of Cr. P. C. The police investigates under section 156, Cr. P. C. and submit final reports or charge-sheets under section 173, Cr. P. C. to the Subdivisional Magistrates concerned. If a case is made out and the accused has to stand his trial, a charge-sheet is submitted and if it is ripe for hearing the Subdivisional Magistrates transfer it under section 192, Cr. P. C. to a Magistrate. If the police investigation does not make out a tangible case against the accused, the police will submit a final report which usually means that irrespective of the fact whether the case is true or not, the case is not fit to come to trial. But the police attitude to the case is not final. The Subdivisional Magistrate has to apply his judicial mind; he may agree with the police report to accept it or he has the prerogative to order the police to submit charge-sheet if he thinks the police report should not be accepted. He has the right to call for the case diary maintained by the police for studying whether a proper investigation has been made by the police. After charge-sheet is submitted, the case is sent for trial to a Magistrate.

Complaints for offences can also be filed by the aggrieved party before the Subdivisional Magistrates or the Magistrates specially empowered to take complaints. Usually complaints for non-cognizable offences are made before the Magistrate who is empowered to take complaints. If from the statement on oath of the complainant, the Magistrate concerned concludes that a *prima facie* case is not made out, he may dismiss the complaint under section 203, Cr. P. C. If he wants, he may hold an enquiry himself or he may order under section 202, Cr. P. C. any Magistrate or the police or any respectable person to hold an enquiry. On getting the report he may hold or order for further enquiry or he may dismiss the complaint or he may summon the accused. When the accused is summoned and the presence of the accused is secured the case is transferred to the Magistrate for trial. The Magistrate's order could be taken to the District Judge in appeal or review under section 407, Cr. P. C. The aggrieved party may file a petition under section 435, Cr. P. C., against the order of the Magistrate before the District Judge for revision or review of the order.

Appeals from the decisions of conviction or acquittal of the Magistrates are heard by the Sessions Judge or Assistant Sessions Judge to whom the cases are transferred by the District and Sessions Judge. Assistant Sessions Judge hears appeals from order passed by the Magistrates vested with second and third class powers. An aggrieved party may take the decisions of the Sessions or Assistant Sessions Judges to the Patna High Court and finally to the Supreme Court. In Supreme Court an appeal will only lie on the point of law and under special leave.

Those cases that do not come under the purview of the Indian Penal Code, but are offences against other Acts mentioned above are filed by the department concerned and by the police and triable by the Magistrates only under sections 144, 145 and 107, Cr. P. C.; the third party may also put the law in motion.

The District and Sessions Judge is both the judicial and administrative head of the judgship. He is usually a member of the Bihar Judicial Service and has served for years as a Munsif and a Sub-Judge. He may also have been recruited direct from the Bar.

There is a District Judge and two permanent Sub-Judges, two permanent Munsifs and an Additional Munsif posted at Dhanbad. The Subordinate Judges are vested with the powers of an Assistant Sessions Judge. The appeals from the decisions of an Assistant Sessions Judge are heard by the Sessions Judge where any sentence of imprisonment for a term not exceeding four years is passed.

Panchayat Courts have been described elsewhere. The *Panchayat* Courts have been given certain statutory powers for disposing of petty criminal cases. The bench and the parties in such cases all come from the same locality and lawyers are a taboo. The main idea is that there will be a compromise failing which there will be a speedy disposal of the case costing very little to the parties concerned.

The role of the lawyers in helping the courts to come to a correct decision must be mentioned. The lawyers on either side work on the same purpose that is to have justice done according to law although seemingly they are at cross purposes. An able lawyer interpretes the facts elicited in the evidence for the benefit of his client and he will never try to mislead the court. The Bar in this district has been covered elsewhere.

JURY AND ASSESSOR SYSTEM.

Mention has to be made of jury and assessor system so far as Criminal Justice is concerned. The names of respectable persons were empanelled as jurors and assessors and an odd number of them was used to be called up and associated with sessions trial. Under the assessor system the majority opinion of the assessors was not binding on Sessions Judge and he would deliver his own judgement

absolutely contradictory to the opinion of the assessors. It was, however, the duty of the Judge to explain the law and the facts of the case as transpired from the examination-in-chief and cross-examination and leave the assessors to come to their opinion.

In a jury system the procedure was the same but the majority opinion of the juror had statutory obligation on the Sessions Judge. The Sessions Judge would either give his judgment accepting the majority opinion of the jury and pass the sentence or he would differ from the majority opinion of the jury giving his reasons and refer the case to his higher court.

It is unfortunate that the jury and the assessor system did not work well. It was difficult to get always the proper type of men as juror or assessors and their opinions were often perverse. Allegations of corruptions against them were common. The jury system was in vogue in Dhanbad district till 30th April, 1961 and from 1st May, 1961 (vide Government notification no. 1479-J, dated 10th March 1961, it stands abolished.

Statistics of criminal cases from 1944 to September, 1950.

Courts.	Nature of cases.	1944.		1945.		1946.		1947.		1948.		1949.	
		Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.
1	2	3	4	5	6	7	8	9	10	11	12	13	14
Sessions Judge,	Sessions cases	30	23	17	24	26	20	28	31	38	26	22	3
Additional Sessions	Cr. Appeals	276	285	240	235	231	241	207	165	213	219	222	25
Judge and Assistant	Cr. Revisions	55	50	50	53	32	33	58	41	83	82	82	0
Sessions Judge, Cr. Reference		..	..	..	..	..	..	..	..	..	..	..	..
Dhanbad.													

1950.		1951.		1952.		1953.		1954.		1955.		Up to Sept. 1956.	
Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.	Instituted.	Disposed of.
15	16	17	18	19	20	21	22	23	24	25	26	27	28
24	23	43	30	56	57	33	52	60	37	46	56	66	65
218	195	283	155	276	310	103	257	293	136	46	56	283	347
65	58	82	67	51	69	44	34	44	45	44	56	32	36
1	1	..	..	1	1	..	..	5	3	1	2	..	1

The statistics of sessions cases from 1957 to 1961 in Dhanbad Judgship are given below:—

Year.	No. of sessions cases pending from before.	Instituted.	Total.	Disposed of.
1957	11	36	47	32
1958	15	25	40	37
1959	3	43	46	40
1960	6	44	50	40
1961	4	55	59	51

ADMINISTRATION OF CIVIL JUSTICE AT DHANBAD.

Dhanbad had the status of a sub-district for many years and its administration with its peculiar problems as such has to be considered on a special footing in a Gazetteer and cannot be cursorily described along with the facts relating to the whole district of Manbhum.* It will be necessary to go into a little history to understand the formation of this sub-district. We have it from the Hunter's Statistical Account and also Coupland's Gazetteer that the district of Manbhum first came to be formed in 1833. From that time onward there have been several changes in its boundary due to exigencies then prevailing. Manbhum does not find much of mention during the early Muhammadan period. Even during the great Mughals it was taken to be a part of Jharkhand and in 1589 Raja Mansingh marched from Bhagalpur, through the western hills of Burdwan *en route* to conquer Orissa and again about 2 years later he sent his Bihar troops by what is described as the western route, called Jharkhand route to Midnapore. In the second journey he seems to have passed through a part of the present district of Manbhum, and a tradition has it, that he effected repairs to some old temples at Para and Telkupi. The first definite mention of a *pargana* of Manbhum is to be found in *Padishanama* where a reference of Panchet has been made. This mention was made in relation as to how the revenue from Panchet was increased from time to time till it came to be an enormous amount of a lakh and forty thousand besides a collection charges of rupees seventeen thousand.

* The Sadar subdivision of Manbhum district in Bihar minus a few portions was made over to West Bengal in implementation of the recommendation of the States' Reorganisation Commission and is now Purulia district in West Bengal (P. C. R. C.).

The principality of Panchet seems to have comprised of the present *parganas* of Jharia, Nawagarh and Katras. Of these Nawagarh, Jharia and Katras are definitely included in Dhanbad subdivision of the present day. In pre-British period Barabhum and Manbhum from which the entire district derives its name were separate principalities constantly at war with Panchet which was by far the strongest of them all. Many of the present Ghatwals were underlings of the Panchet Raj or other principalities and were created for the purposes of protection of the estate from the military depredation. In some cases the Ghatwals were in the nature of service tenure-holders, under the Raja who granted it. Later, during the British rule, the importance of these Ghatwals began to dwindle in proportion to the control, which the Central power assumed in quelling down disturbances and maintaining internal peace by their own force. At present the existence of these Ghatwals, with their tenures has become an anachronism, the reason for which they are fast disappearing and dwindling away.

Now coming back to the history of Manbhum district it will appear, that serious attempts were made by the British authority, to consolidate the district and maintain peace and order. There were not only internecine quarrels between the local Rajas of Barabhum, Manbhum and Panchet but internal peace of each of the principalities were threatened by *Chuars* of Barabhum. In 1773 sepoy were permanently stationed at Barabhum to prevent recurrence of outbreak of depredation by *Chuars*. Earlier in 1767 Lt. Furguson had subjugated the Rajas of Manbhum and Barabhum who seem to have been recalcitrant and did not view the grant of the *dewani* to the British with favour. There is no history of such recalcitrance on the part of Panchet. It will, however, appear that in 1782 and 1783 there was some sort of rising in Panchet which consisted the Jhalda, Nawagarh, Jharia and other *parganas*. The disturbances continued at intervals in various parts of the Panchet till 1795 when a permanent settlement of the area was finally effected and an effective control was established. In 1795 that is just after the permanent settlement an interesting event took place which resulted in transference of the jurisdiction of the area now covered by this subdivision to the Collector of Birbhum. The Estate of Panchet was put up to sale for arrears of revenue under the new fangled revenue sale law and purchased by one Nilamber Mitra for almost nothing. The proprietor pleaded for a cancellation of the sale on the ground that the *Dewan* had in collusion with the Collectorate staff brought about the sale. The plea failed before the Collector of Ramgarh (at present in the district of Hazaribagh) and the authorities were bent upon to effect a delivery of possession in favour of Nilamber Mitra. By 1798, the entire principality was in a ferment and the tenantry as a whole supported their Chief, in such a violent manner and the *Chuars*

played such an important role, in that outbreak that the Government had to yield and set aside the sale and restored possession to the Chief. This episode in later time is said to have encouraged the Raja during the mutiny to adopt defiant attitude towards the Government. But, however, that may be, some important results followed.

It was found that the administration of Panchet, which comprised a large part of what is now comprised within the sub-district and now of the district of Dhanbad was inconvenient from Ramgarh and revenue and civil administration was transferred to the Collectorate at Birbhum. Even from before this Pandra was within the Collectorate of Birbhum and from the records of the Pandra Succession case it will appear that in earlier period (1793) a case for succession to the Pandra estate was filed in the District Court of Birbhum. It appears that sometime after the granting of the *dewani* to the British the jungle tract of Chotanagpur and probably a part of Orissa was constituted into a district torn away from Midnapur division called *Zila Jungle Mahal* by Regulation of 1805. The principalities contained within this *Zila* had chieftains who had peculiar rights and customs regarding succession. By the regulations 10 to 18 of 1800 it was enacted that these peculiar rights and customs prevalent amongst principalities of *Zila Jungle Mahal* shall be respected and if a dispute regarding successions rose, due weight should be given to the family custom of the chieftains. The Court should not flout the customary law, prevalent amongst them. Later in 1833 the district of Manbhum was carved out from a portion of the jungle *mahal* comprised within S. W. Frontier Agency which roughly corresponds to the present Chotanagpur Division (established in 1854) and probably included Jashpur, Rajganjpur, Surguja, Bonai, etc. During the constitution of this district (Manbhum) the *parganas* of Senpahari, Sergarh and Bishunpur were transferred to Burdwan while Chatna and Maheshwara adjoining to Kashipur were transferred to the district of Bankura.

The district of Manbhum with somewhat similar boundaries was first established in 1833 with its headquarters at Manbazar. The headquarters were transferred to Purulia which was certainly more central though at the time it was full of jungles and had little importance as a place of commerce.

From the earlier documents it appears that the freshly constituted district was known as "Division" Manbhum (*Angsa* Manbhum). It was so described in various plaints filed from 1842 to 1857. A plaint in *Debaseba* suit no. 32 of 1858 describes the district as *Kismat* Manbhum which is equivalent to *Angsa* Manbhum. Similarly the civil suit no. 30 of 1882 filed by the contesting parties of Pandra for succession describes the plaintiff as an inhabitant of Pandra appertaining to *Zila Angsa* Manbhum. This suit was originally filed in the district court of Burdwan but by High Court's

order was transferred to Manbhum and recorded as Civil Suit no. 4. A *robakary* or an order made after enquiry by the principal Civil Court in Civil Suit no. 3 of 1859, shows that it related to Civil Court of *Angsa* Manbhum at Purulia and was signed by Mr. G. M. Oaks.

The district so constituted was placed under the administration of a Deputy Commissioner who seems to have been controlled by a Commissioner posted at the headquarters of S. W. Agency. So far as administration of criminal justice was concerned the Deputy Commissioner was assisted by the Deputy Magistrate and later came to be assisted by Honorary Magistrates at Jhalda, Raghunathpur, Adra, Pokhuria, Jharia and Katras. In matters of revenue, there seems to have been various kinds of officers. It was found that Manbhum was constituted out of the Jungle *mahal* which formed a district in early British administration. There was specially law of primogeniture prevalent amongst the local chieftains and the British Government tried to maintain their local custom for which the regulations 10 to 18 in 1800 came into existence. It is probably with that end in view and to afford special facilities to these chieftains who were considered important from an administrative standpoint, an Agent to Governor-General similar in status to the Political Agent of later times was placed at Chutia Kishanpur. It appears that the Agent Commissioner of the S. W. Frontier Agency under whose charge the district of Manbhum remained acted for a long time as an Agent to the Governor-General. Later in 1854 the Chotanagpur Division with headquarters at Ranchi was formed and the district came to be under it.

Now if a dispute about succession arose then the suit relating to such succession which were essentially of the nature of civil suits seems to have been entertained by the Agent acting through Assistant Agents. It will appear that in Manbhum this practice was followed. A *robakary*, dated 23rd September, 1839, shows that Raja Sagar Narain Singh of Pandra being aggrieved by the decision which was made by the *Sadar Dewani Adalat* upholding a partition of the impartible estate of Pandra had filed a petition for ascertaining the customary rights of the family *dastur khandan* before the Agent to the Governor-General of Chutia Kishanpur. This petition by *robakary* was referred to the Assistant Agent of Manbhum and in pursuance of that *robakary* writs were issued upon the Raja by the Assistant Agent at Purulia on 15th October, 1839 to produce the paper to prove the *dastur khandan*.

It will appear from this document that though the matter of partition was closed by the decision of the *Sadar Dewani Adalat* late in 18th century effort was being made by the Raja to take up the matter again. This leads to the inference that in matters of custom of succession in the principalities of jungle *mahal*, the *Sadar Dewani Adalat* which was in the position of High Court was not the

final authority and the Governor-General in Council had power to intervene if upon subsequent ascertainment the facts appear otherwise than what has been decided by the *Sadar Dewani Adalat*. It is in accordance with that provision that the Agent to the Governor-General was acting and there was a Court at Chutia Kishanpur for the purpose. That Court functioned almost as a Civil Court of a special jurisdiction and Courts subordinate to it functioned in the district through the Assistant Agent of Manbhum. Presumably the Collector acted as such and his designation while considering in such cases, was the Principal Assistant Agent to the Governor-General. There were several disputes relating to succession in the area covered by what was the sub-district and now the district of Dhanbad. Suits were filed in the Court of the Principal Assistant Agent. A dispute arose regarding to the succession of the Nowagarh Estate and the suit seems to have been filed before the Principal Assistant Agent on 7th September 1834. The *robakary* of the Principal Assistant Agent which was known as the *robakary* of the Civil Court because in such matters the Assistant Agent exercises something like a civil jurisdiction though under special law. The Agent to the Governor-General has also in some documents been described as Agent and Commissioner. This shows that the Commissioner of the Division acted also as the Agent. We have *robaharis* of Civil Court and the Agent of Governor-General at Chutia Kishanpur which describes Captain John Ousely as Agent of Governor-General at Kishanpur in 1845. From all these documents it will be clear that besides the Commissioner and the Deputy Commissioner exercising criminal and revenue jurisdiction there was a Court of Special Constitution which decided civil matters relating to customary succession amongst the principalities contained within the area formerly included in jungle *mahal* the Chief Court of which was situated at Chutia Kishanpur (Ranchi). He had subordinate courts under him and they were presided by Principal Assistant Agents. This Court was supposed to function directly under the Governor-General and though they respected the decision of *Sadar Dewani Adalat*, was not bound by their decision as in other suits. The Agent to the Governor-General and the Principal Agent though purporting to be civil functionaries were mainly administrative officers of the district and the Division.

So far as the Civil Courts are concerned it appears from the old records that as in other districts at the period Manbhum had not the institution of *Sadar Amins* nor had a *Zila Judge* at its head. Though Manbhum was constituted into a district and was called *Zila Angsa* Manbhum or Division Manbhum the head of the Judiciary was stationed at Ranchi and known as Judicial Commissioner. The Principal Civil Courts in the district seem to have been run by the Principal Assistant Commissioners who were directly under the Judicial Commissioner of Chotanagpur and at a later

period the functions that were exercised by the Principal Assistant Agents seem to have been transferred to them. They have had besides the power to hear appeals from Munsif and to entertain ordinary Civil Suits in the original jurisdiction. Suits of lower value as usual used to be filed before the Munsif. The Deputy Commissioner of Manbhum and in many cases persons placed to assist him as additional acted as Principal Assistant Commissioner by virtue of powers vested on them by the Government through Judicial Commissioner. It will appear from the judgment in Pandra succession case filed in the year 1882 that the suit relating to succession was filed before the Subordinate Judge of Burdwan (the institution of *Sadar Amins* by this time having given way to that of Subordinate Judge in other districts) was transferred by the orders of High Court to Subordinate Judge at Manbhum who was also a Deputy Commissioner. The suit was retransferred for decision of certain issues and appointment of a receiver to the District Judge of Burdwan who having appointed them asked the Judicial Commissioner of Chotanagpur to select a Judge for trial of the suit. It was given for trial to Mr. Risely who was transferred. Mr. Risely purported to act as Subordinate Judge by powers vested in him by the Judicial Commissioner of Chotanagpur but later when he was transferred the case was made over to Babu Gangananda Mukherjee who purported to act as Second Sub-Judge, Manbhum was a Deputy Magistrate stationed at Purulia and had been vested with the powers of a Sub-Judge. The records and the tradition will show that he acted in various capacities also such as District Sub-Registrar, the Land Acquisition Officer and even as *De-facto* Deputy Commissioner of Manbhum. However, that may be in the beginning of sixties of the last century and even up to much later date the function of Principal Civil Court was exercised by the Principal Assistant Commissioner and we have from the records a corroboration of this fact. A *robakary* of Civil Suit filed by Rani Hingan Kumari of Pandra shows that a suit was originally filed in *Chauki* Raghunathpur before the Munsif who was transferred to the Principal Assistant or Commissioner of Manbhum at Purulia and is signed by Mr. G. N. Oaks. Presumably because the suit involved points which were more than the Munsif could entertain. This was in 1859. There are other documents even of a later date showing that the institution of Principal Assistant Commissioner continued just as the institution of the *Sadar* continued in other districts till they were replaced by Sub-Judge. The Munsifs of course were there at Manbazar, Barabazar, Raghunathpur and finally at Purulia but they were not Principal Civil Courts. It is also clear that the Deputy Commissioner acted as Principal Assistant Commissioner in many cases and the practice of the Deputy Commissioner or the Deputy Magistrate being vested with the powers of the Sub-Judge to which the Principal Assistant Commissioner corresponded, continued in Manbhum for a pretty long time.

The boundaries of the present district of Manbhum came to be fixed and remained practically identical from 1879. The head of the district administration had to bear responsibilities about matters of administration, revenue and up to some extent criminal. So far as administration of civil justice and sessions cases were concerned the head of the administration continued to be the Judicial Commissioner of Chotanagpur for a pretty long time. It will thus appear that the judgeship was not co-extensive with the boundaries of the district and it has never been so up to this date. As it is said the functions of the Principal Civil Court within the district were exercised originally by the Deputy Commissioner acting under the delegated power from the Judicial Commissioner, Chotanagpur as Assistant Commissioner. Later the function of the Assistant Commissioner began to be limited and he worked as a Subordinate Judge. But the function continued to be exercised by the Deputy Commissioner and Senior Deputy Magistrates for a pretty long time. Even in late eighties of the last century there was no regular Subordinate Judge posted in the district. For a considerable part of the nineteenth century the Judicial Commissioner tried sessions cases by holding regular circuit at places. But later it was found very convenient for Bankura District Judge to come over to Purulia to hold circuit courts. Thus for a time, therefore, the Additional District Judge of Bankura used to hold circuit courts at Purulia and tried sessions cases and hear civil appeals till in 1910 a regular judgeship came to be constituted in Manbhum and a District Judge was placed at the head of the judiciary. But the judgeship comprised within its administration not only Manbhum but also the districts of Singhbhum and Sambalpur. Eventually with the separation of Orissa as a Province, district of Sambalpur went but for a long time Singhbhum remained tagged to the Judgeship of Manbhum. The District Judge at Purulia from the very start of the judgeship held circuit courts at Dhanbad. He used to hold circuit courts not only in the headquarters of the districts of Singhbhum and Dhanbad, but also at Jamshedpur. From the inauguration of a Subordinate Judge's Court at Dhanbad the District Judge was regularly holding circuit courts at Dhanbad also.

Administration of Civil Justice after 1956.

Before the creation of a separate judgeship of Dhanbad-Singhbhum, i.e., up to 31st October, 1956, the Judicial staff entertained for the purpose of civil justice consisted of the District Judge whose headquarters were at Purulia, the Subordinate Judge and the Munsif of Dhanbad. They were assisted from time to time by Additional District Judges, Additional Subordinate Judges and Additional Munsifs. Up to this date the civil suits up to the value of Rs. 4,000 were decided by the permanent Munsifs, up to the value of Rs. 1,000 by the Additional Munsifs and above Rs. 4,000 by the Subordinate Judge and the Additional Subordinate Judge. These courts also

decided execution and miscellaneous cases arising from their own decisions. The Subordinate Judge of Dhanbad was vested with the powers of a District Delegate under the Indian Succession Act to grant Probate and Letters of Administration in non-contentious cases and to try insolvency cases arising in Dhanbad subdivision in which the debts mentioned in the insolvency petition did not exceed Rs. 5,000. He was empowered to exercise the functions of a District Judge under Part X of the Indian Succession Act for the disposal of Succession Certificate cases within Dhanbad subdivision. He was also authorised to entertain all civil appeals from the decrees or orders of the Munsifs of Dhanbad which lay to the District Judge with effect from 7th April, 1953. At Dhanbad rent suits were and are tried by the revenue courts and not by the Civil Courts. The civil returns of the Subordinate Judge and Munsif were submitted to the District Judge and the latter submitted them to the Hon'ble High Court along with the civil returns of the districts of Manbhum and Singhbhum. The appointment and dismissal of the Civil Court staff at Dhanbad were made by the District Judge of Manbhum-Singhbhum. The latter also heard and disposed of appeals on decisions of the Subordinate Judge up to the value of Rs. 5,000.

The Judgeship of Dhanbad-Singhbhum was created on 1st November, 1956. Since then the judicial staff maintained for the purpose of civil justice in the district of Dhanbad has consisted of the District Judge of Dhanbad-Singhbhum with his headquarters at Dhanbad, two permanent Subordinate Judges and two Munsifs. The District Judge was assisted for sometime by two Additional District and Sessions Judges and thereafter the Court of one of the Additional District Judges was abolished. Up till now civil suits up to the value of Rs. 4,000 are decided by the permanent Munsifs and over Rs. 4,000 by the Subordinate Judges. These Courts, as before, decide execution and miscellaneous cases arising from the decision of their own Courts.

Now that there has been a District Judge at Dhanbad and the powers of the Subordinate Judge to entertain appeals from the decisions of the Munsifs and also the powers of a District Delegate to grant Probate and Letters of Administration, have been taken away. Of the two Subordinate Judges the seniormost Subordinate Judge has been invested with powers to exercise functions of a District Judge under Part X of the Indian Succession Act for disposal of Succession Certificate cases arising within the district and also to try insolvency cases arising in the district in which the debts mentioned in the insolvency petition do not exceed Rs. 5,000. Rent suits are still tried by the Revenue Courts and not by the Civil Courts. The civil returns so far as the Courts at Dhanbad are concerned are now submitted to the Hon'ble Court by the District Judge of Dhanbad-Singhbhum. The District Judge and the Additional District Judge hear and dispose of appeals from the decisions

of the Subordinate Judges up to the value of Rs. 5,000. The appeals from the decisions of the Munsifs are ordinarily transferred to the Subordinate Judges for disposal.

For the purposes of adjustment of work the District Judge has divided the jurisdiction between two Subordinate Judges and two Munsifs over the local areas included in the police-stations given below under the provision of section 13 (2) of Bengal, Agra and Assam Civil Courts Act, 1887.

1st Subordinate Judge and 1st Munsif.—(1) Govindpur, (2) Jharia, (3) Kenduadih, (4) Dhanbad, (5) Baliapur, (6) Jorapokhar, (7) Jogta and (8) Sindri.

2nd Subordinate Judge and 2nd Munsif.—(1) Nirsha, (2) Chirkunda, (3) Tundi, (4) Chas, (5) Chandankiary, (6) Topchanchi, (7) Baghmara and (8) Katras.

Dhanbad now has a separate judgeship which was a necessity after Dhanbad became a full-fledged district.

We can now follow the history of the Courts at Dhanbad in the light of what has been said above. A little more of history will be interesting in this connection. Anybody passing by a car on the Grand Trunk Road from Govindpur to Nirsha will find two pillars which look like ruined gates of a compound, four miles east of Govindpur leading to a place, little known, and obscured almost into oblivion. This place called Baghsuma was formerly the site of headquarters station of a subdivision which later came to be known as Govindpur subdivision. The comparative disadvantage of communication from the Divisional Headquarters of S. W. G. Agency and later of Chotanagpur might have prompted the authorities to remove headquarters station from Baghsuma to Govindpur for Govindpur had the advantage of being on the Grand Trunk Road and near other roads connecting places of importance within the district. If a survey was made as to how any shifting of courts was made in places in India it will be found that the courts have followed closely the routes of communication and commerce and the shifting of courts from Baghsuma is probably one such potent instance. Being on the Grand Trunk Road which used to be the life-line of commerce in this area, Govindpur had certainly a very great commercial importance in the later part of 19th century as also beginning of the 20th century. The Railway line had not been extended further beyond Barakar till the nineties of the last century. The only means of communication with the up-country used to be the Grand Trunk Road and since Govindpur had the advantages mentioned above the courts at the subdivisional headquarters naturally came to be located there. Later in 1894 with the extension of the Grand Chord Line to Katras and to Jharia its importance gradually dwindled for the Grand Trunk Road could not then be said to be the chief means of communication and commerce. Much

of that purpose was taken up by the freshly opened Grand Chord Line which later extended up to Mogalsarai connecting the main line to Delhi. Railway was certainly faster and easier means of transport than any known vehicles in the late nineties. Govindpur was, therefore, surely to lose its importance as a place of commerce, the bulk of which was taken up by Railways. The natural consequences followed:—A very centrally situated place in the subdivision connected by Railways was sought for and Dhanbad appeared to be ideally situated. In the meantime certain events took place. Even as early as 1869 during the revenue survey a report was made by Colonel S. J. Sherwell that valuable coal seams could be found in Jharia and Katras area. But in spite of the fact having been corroborated by other reliable persons, the Superintendent of Geological Survey in India was of the opinion that the coal seams found there would not be worth the costs of extraction and no serious effort was made at extraction of coal. What exactly led to this opinion cannot be ascertained at this distance, but a suspicion cannot be ruled out that the Superintendent did not find much to enthuse over the discovery and make a serious attempt to assess the value of the coal because the commercial interests who were mainly British in those times were shy and doubtful about the venture. But this opinion of the Superintendent did not deter for a long period, the development of coal area in Jharia and Katras.

The Railway in their own interest and as a matter of experiments extended their lines up to Katras and then to Jharia. Connections having been opened surprising results were obtained and extraction of coal rose almost ten times the usual extraction in the very first year that the Railway lines were opened. It was found that all extra extractions that had been made were from the fields at Jharia and Katras. The results were tremendous. Jharia and Katras area which is close to Dhanbad grew in proportion which was almost unbelievable at the time. The centre of economic gravity had, therefore, shifted in the beginning of the 20th century from Govindpur to Dhanbad necessitating the removal of subdivisional headquarters from Govindpur to Dhanbad. Mining had its peculiar problems. Industry grew and the administration of the area under the industry began to present problems which had to be examined from closer quarter and Dhanbad certainly was at a closer quarter. In the year 1906 a decision was made that the Courts should be transferred to *moouza* Hirapur within the Municipality of Dhanbad and in 1908 the headquarters were actually shifted. Since then Dhanbad has been growing in importance. The S. D. O. who was formerly the head of the administration in the subdivision in the civil administration came to be vested with more and more powers and before the third decade in the 20th century was out, his powers came to be identical with that of the Deputy Commissioner of Manbhum. The powers of the Subdivisional Police Chief also were similarly increased from time to time till they became identical

with that of the Superintendent of Police stationed at Purulia and the head of the administration in the subdivision came to be known as the Additional Deputy Commissioner rather than the S. D. O. and the head of the police administration came to be known as the Additional Superintendent of Police. For some years a formal subordination was maintained and the Additional Deputy Commissioner and the Additional Superintendent of Police were considered in some way subordinate to the Superintendent of Police and the Deputy Commissioner of Manbhum. With the exigencies created by the running of the administration gradually the subordination of the Additional Deputy Commissioner was liquidated. Formerly the Additional Deputy Commissioner was assisted by a Senior Deputy Magistrate who functioned almost as a S. D. O. but was not termed as such. But since the beginning of Second World War there has been a Subdivisional Officer functioning under the Additional Deputy Commissioner, Dhanbad has been constituted into a regular police district before Dhanbad became a civil district. All these point to the fact that Dhanbad was not a subdivision now but a sub-district and the status was raised to a full-fledged district later as has been mentioned elsewhere.

It is in this light that the administration of Civil Justice in this area has to be considered. It has to be traced back the origin of the Civil Courts at Dhanbad. It is from the correspondence maintained at the Civil Courts at Dhanbad that a Munsif came into existence at Govindpur some where in the late nineties. It has been shown that Govindpur was constituted into a subdivision in 1850 but it is clear from later documents that a regular Civil Court did not function there. In 1859 a suit was filed by Rajkumar Kali Prasad Singh against Rani Hingan Kumari for possession of a share in the Zamindari. The judgment in this suit dated 28th March 1860 and a *robakary* dated 29th January 1859 showed that the suit was withdrawn from the Court of the Munsif, Raghunathpur and that suits of this nature used to be filed at Raghunathpur. Considering the importance of the matter the suit was withdrawn from Raghunathpur to the file of the Principal Assistant Commissioner who was also the Deputy Commissioner of Manbhum.

There is another document which points to the fact that till 1882 the Courts having civil jurisdiction were not established at Govindpur. This is the plaint of Pandra succession case. There the plaintiff had described himself as Pratap Singh, an inhabitant of Garh Pandra, Zila Angsa Manbhum and Chauki Raghunathpur. This suit was filed after the death of Hingan Kumari and came up in the wake of scramble for power after the death of Hingan Kumari over the properties of Pandra estate. It is clear from the documents that after the death of Rani Hingan Kumari the Deputy Commissioner, Manbhum ordered the S. D. O., Govindpur to take possession of the estate. A letter, dated 28th December, 1881, from Babu Gopal Chandra Mitra, the Deputy Magistrate, Govindpur, shows

that he was commissioned to prepare a list of properties left by Rani Hingan Kumari. This unmistakably shows that Pandra Estate was administratively under the control of the S. D. O., Govindpur. In the circumstances the mention of *Chouki* Raghunathpur in the plaint of civil suit in relation to succession could only mean that at Govindpur there was no regular court exercising civil jurisdiction and that courts of civil jurisdiction which had powers to try suits for the area which is now comprised within a part of this subdivision was vested in the Munsif stationed at *Chouki* Raghunathpur. This was certainly the area covered by the normal part of this subdivision. It is, however, not clear whether the suits covered by the area Nawa-garh, Jharia, Katras, Topchanchi used also to be filed at Raghunathpur or elsewhere. In the late nineties, however, courts of regular civil jurisdiction came to be there in Govindpur. From the returns of 1896 submitted to the Judicial Commissioner, Ranchi, it will appear that the Subdivisional Officer acted as an *Ex-officio* Munsif. The returns of 1898 were sent under the signature which seems to be of Mr. Garrett, the then S. D. O. of Govindpur. At times the other Magistrates along with the S. D. O. used to officiate for him for the returns showed that Mr. H. W. Scroop was in charge of the Munsifi for a time. No Munsifs were permanently stationed at Govindpur for the practice seems to have been that the S. D. O. as Munsif-in-charge used to entertain all suits and dispose of the uncontested cases. Later those in the usual cadre used to come to Govindpur and try the contested suits as also such of the *ex parte* ones which could be disposed of by them during their stay. There is a very interesting letter preserved in the correspondence file showing that the Munsif used to hold court in circuit and was alternatively known as the Munsif of the place where they were holding courts. The letter dated 14th May, 1898, addressed to Mr. S. C. Hussain, Munsif of Govindpur who was also described as Munsif of Chaibasa by one Mr. T. P. Mukherjee, the *sherishtadar* of the Munsif's Court, Govindpur. This will show that besides holding courts at Govindpur the Munsif used to hold courts at Chaibasa where also he was not permanently stationed. A letter from Babu Sarda Pada Chatterjee, the Subordinate Judge of Manbhum, to the Munsif of Govindpur on the 23rd day of July, 1898 is interesting in this connection. The Subordinate Judge requested the Munsif not to hold courts at Chaibasa in the month of August. Reasons were explained in the letter and read as follows:—"However, you are new-comer in this division. I think it proper to inform you that it will be very inconvenient for both the Sub-Judge and the Munsif to hold sittings at the same time at Chaibasa". Firstly because there is only one court house at Chaibasa available for the Sub-Judge and the Munsif to hold their sittings. Secondly because there is only one Hindi-knowing clerk whose services by order of the District Judge were to be availed by the Sub-Judge. This shows that the Munsif was neither permanently stationed at Govindpur and held his circuit

courts there nor was he stationed permanently at Chaibasa. It is not known where the headquarters were.

There is another very interesting letter which will throw some light on the situation. The draft seems to have been prepared on the 18th April, 1898 and was addressed to the Judicial Commissioner of Chotanagpur. A complaint appears to have been made in a previous letter about the inconvenience of residing at Govindpur during the Circuit Courts. In continuation of that letter no. 6, dated 8th April, 1898, it was pointed out to the Judicial Commissioner that the S. D. O. had lent the use of one of his tents where he had placed his *sherista* and after the court hours occupied it as his private residence. The *Ijlas* was held in a room of the Cess Bungalow and the Munsif pointed out that on an earlier occasion a Deputy Magistrate had been deputed to work as Munsif and had occupied two Cess Bungalow rooms, one for residence and the other for *Ijlas*. He begged the Judicial Commissioner to ask the S. D. O. to permit him to use two rooms in the Cess Bungalow one for his residence, the other for his *Ijlas*. In reply to that letter the Judicial Commissioner's answer was that the Munsif was to use the Cess Bungalow room for his residence and use the tent for his office. This correspondence seems to have been occasioned by a letter of the Deputy Commissioner Mr. Macyaire to the Executive Engineer that he had allotted the Excise Bungalow of Govindpur to a Sub-Deputy Magistrate on a proper payment of rent. The claim of the Munsif to use it as office and residence was not tenable as the Munsif's stay at Govindpur was purely temporary. A copy of this letter was forwarded to the Munsif of Govindpur-cum-Chaibasa and he was asked to report about the accommodation of the court and residence. The memo. came under the signature of Mr. Taylor, the Judicial Commissioner of Chotanagpur stationed at Ranchi who asked the Munsif to report about the accommodation of courts and residence. The correspondence undoubtedly points out the serious inconvenience to which the Munsif was placed for having his circuit duties in the above manner. The whole system seems to have been cumbrous and irksome and it can be imagined that a considerable amount of dissatisfaction must have been harboured by the Munsif who had to run like a shuttle cock from Govindpur to Chaibasa and from Chaibasa to Govindpur in those days of difficult communications. This state of things did not continue for long. In the returns of 1901 it can be found that Jnaendra Chandra Banerjee was vested with powers of Small Cause Court and there is an endorsement in the return that he presided over the Courts at Govindpur throughout the year and devoted 186 days on civil works, 5 days in criminal work and 5 days in revenue work. It is said, that by that time the Court at Govindpur came to have a permanent Munsif who was vested not only with power to try civil suits of lower valuation but also revenue suits which are under the Chotanagpur

Tenancy Act within the exclusive jurisdiction of the Deputy Commissioner and can be entertained by any other person only when the Deputy Commissioner authorises him under the Act itself to exercise those powers. In 1908 this Munsifi was transferred to Dhanbad and before this transfer the Munsif was vested with criminal power, but he continued to exercise revenue power and the returns of 1909 and other years show that the revenue powers were exercised by the Munsif till as late as 1915 and the Munsif was finally relieved of all the responsibilities of a Rent Suit Deputy Collector and at present is not empowered to try a suit under the Chotanagpur Tenancy Act.

So far as the pecuniary jurisdiction of the Munsif is concerned it is not clear from the returns filed from Govindpur or the Administration Report submitted from Dhanbad as to what was the extent of the Munsif's power in that late nineties of the last century and within the first two decades of the present one. It is certain that from the third decade of this century the Munsif has wielded a power to try suits valued at Rs. 2,000 and S. C. C. suits valued at Rs. 250. The exigencies created by changing condition necessitated an increase in the pecuniary jurisdiction of Munsif and at present the permanent incumbent exercises powers to try suits valued at Rs. 4,000. The limits of the Small Cause Court powers had not been increased as it possibly could not have been done under the Provincial Small Cause Court Act.

It will appear that in later years a Judicial Officer having powers to try suits of lower value was not found sufficient for the purposes of administration of civil justice in the subdivision. Suits of higher value continued to be filed in Subordinate Judge's Court at Purulia. In earlier days the suits were not too numerous to justify the establishment of a Subordinate Judge's Court at Dhanbad itself nor had the commercial community become vociferous enough. The subdivision, however, took a very rapid stride on the road to prosperity and during the period between 1914 to 1917 there was a boom in the coal market due to stoppage of import of coal from the United Kingdom and Natal. The First World War and the attendant blockade and difficulties of shippings, communications hustled the Jharia Coalfield into an amazing prominence and Dhanbad grew to be a subdivision of first rate commercial importance. It was then that a serious thought began to be given to the idea of having a Subordinate Judge stationed at Dhanbad for trying suits of higher value arising within the local limits of Dhanbad Munsifi. We can imagine the anxiety of the big commercial concerns in this respect and there seems to have been quite a lot of public feeling supported by a strong opinion from the bar in favour of the proposal. Ultimately the Government decided to

have a Subordinate Judge stationed at Dhanbad and the notifications, dated 21st September, 1917 reads as follows:—

“No. 235-A.P.—In exercise of the powers conferred by section 13, sub-section (1) of the Bengal, Agra and Assam Civil Courts Act (Act XII of 1887), the Lieutenant Governor in Council is pleased to declare that the local limits of the Subordinate Judge of Purulia with effect from 31st October, 1917.”

“No. 233-A.P.—In exercise of the powers conferred by section 13, sub-section (1) of the Bengal, Agra and Assam Civil Courts Act (Act XII of 1887), the Lieutenant Governor in Council is pleased to establish with effect from 31st October, 1917 a Subordinate Judge's Court at Dhanbad in the district of Manbhum and to fix with effect from that date the local limits of the executive subdivision of Dhanbad as the local limits of his jurisdiction.”

The notification shows that not only the territorial jurisdiction of the Subordinate Judge of Purulia was curtailed but a Subordinate Judge was installed at Dhanbad to try cases of higher value arising within the local limits of Dhanbad Munsifi. The arrangement was somewhat peculiar when the Court of the Subordinate Judge first came to be established here. It appears that all the filings in the civil courts were to be made in the Court of the Subordinate Judge and he was to select cases to be tried by the Munsif of Dhanbad in accordance with the power of the Munsif posted. The *sheristadar* was one and for four consecutive years after the start, administration report of the entire civil courts was one and used to be submitted by the Subordinate Judge of Dhanbad. This was somewhat of a peculiar arrangement for what usually happens when a new court established is that a separate court is brought into existence without disturbing the former one. In this case the Subordinate Judge was considered to be the Principal Civil Court in the subdivision and all the filings whether they related to the Munsif of Dhanbad or to the Subordinate Judge of Dhanbad were to be made in the Subordinate Judge's Court. The reason for this step seems to have been that the authorities were not quite sure in their mind as to whether the Subordinate Judge at Dhanbad will from the start have sufficient work to keep him engaged throughout the year. By this time it had been found that the Additional Munsif had to be posted too often at Dhanbad and part of the work that might have been done by the Additional Munsif could be absorbed by the Subordinate Judge himself if he found his own work to be insufficient. A formality for calling for a suit from the Munsif's Court, which the District Judge could alone transfer was dispensed with by this device. There might have been also some difficulty about sanctioning adequate number of staff for the newly-created Subordinate Judge's Court at Dhanbad. A joint staff was

therefore, considered for some time to be necessary. Later this practice was discontinued and the Munsif's office instead of being directly controlled by Subordinate Judge's office had its separate establishment since 1921.

Even so under that arrangement the over-all control of the Subordinate Judge in matters of administration was very much larger than any other districts of Bihar. It may be pointed out for instance that though the Munsif held charge of the Copying Department under the orders of the District Judge yet the staff drew their salary and for all practical purposes were considered to be the staff of the Subordinate Judge. Any leave or permission of any nature to the staff was granted by the Subordinate Judge. The *Nazarat* Department was directly under the supervision of the Subordinate Judge himself. The Record Room was under the control of the Subordinate Judge although the Munsif was in charge. The Forms Department was under the supervision of the Munsif but the clerks in the Forms Department belonged to the establishment of the Subordinate Judge. The Munsif had direct control only over his own office and not the other departments placed under his supervision. This was not so in other districts. The idea probably seems to have been to make the Subordinate Judge a little more powerful in administrative matter by giving him a larger measure of discretion which was not usual in other districts. This was in keeping with the tendency that was discernible in the case of S. D. O. and other administrative officer in this subdivision. The first three or four Subordinate Judges exercised the powers of Assistant Sessions Judge and tried cases which were ultimately tried by Magistrates vested with powers under section 30, Cr. P. C. Messrs. Brajendra Kumar Ghosh, first Subordinate Judge of Dhanbad, Ashutosh Mukherjee, his successor and Amrita Nath Mitra who succeeded Mukherjee had all exercised sessions power. From the time of Pandit Ramchandra Chaudhury in the year 1932 it is not found that any sessions cases were tried by the Subordinate Judge. The subsequent Subordinate Judges exercised no criminal power at all. It was in the year 1942 when the August Movement took place and there was a large number of criminal cases which required speedy disposal and special attention, there were special legislations such as Defence of India Rules. Higher punishment than what could be inflicted by the Magistrates wielding ordinary powers had to be given. The Subordinate Judge posted here (Mr. Jatindra Nath Das Gupta) was empowered to deal with such cases and for a time he exercised those powers. After a time this power was withdrawn but in 1948 it was found necessary that the Subordinate Judge should wield power to try criminal cases of importance. In 1948 the Subordinate Judge posted at Dhanbad was vested with the power under section 30 of the Cr. P. C. and since then all the Subordinate Judges who have come in succession have exercised criminal powers to try cases which are ordinarily triable by the Assistant Sessions Judge.

So far as civil jurisdiction of the Subordinate Judge is concerned it seems to have followed the line of other officers in the subdivision. The powers had been enlarged from time to time till they were made to correspond in some respects with the powers exercised by an Additional District Judge. The Subordinate Judge was vested with the powers to entertain applications for insolvency which is within the special jurisdiction of the District Judge. A limitation, however, was placed and an application in which insolvent's debts exceeded Rs. 5,000 could not be entertained. This power seems to have been vested on the Subordinate Judge some time in 1928. He was also empowered to entertain applications for probate letters of administration and succession certificates. So far as probate cases and letters of administration are concerned the only limitation placed on the Subordinate Judge was that he was to transfer the cases to the District Judge as soon as caveat is entered and the proceeding became a contested one. So far as the succession certificate cases are concerned no limitation was placed and the Subordinate Judge can entertain and try cases relating to succession of any value.

Under the Government notification no. 216-R., dated 18th May, 1953, another power belonging exclusively to the District Judge was conferred by the delegation to the Subordinate Judge of Dhanbad. He was empowered to function as court under the Land Acquisition Act of 1894. A large number of cases were transferred to the Subordinate Judge of Dhanbad for his decision. Many of those cases related to the acquisition made at Jamshedpur and a loud complaint was made by the Purulia Bar that the trial of those cases at Dhanbad necessitated their clients to go from Jamshedpur to Dhanbad. Purulia being more centrally situated was a more convenient place for their clients to come and contest. It is on those representations and when the files have considerably been reduced and that the Land Acquisition cases were finally withdrawn under notification no. 145-R, dated 7th January 1954. It will appear from this that the powers of the Subordinate Judge at Dhanbad were made to extend to some extent with that of the District Judge. Government might have placed an Additional District Judge but the amount of work probably did not justify this step and, therefore, this device of enlarging the powers of the Subordinate Judge seems to have been taken recourse to. It will also be necessary to mention that from 1953 the Subordinate Judge had been empowered to entertain appeals from the decision of the Munsif at Dhanbad. Ordinarily those appeals used to be filed at Purulia and transferred to the Subordinate Judge, Dhanbad for disposal. This certainly inconvenienced the parties. After considerable agitation from the Bar it was decided that the appeals could be filed before the Subordinate Judge who would eventually hear them also.

Administratively the Subordinate Judge was under the direct control of the District Judge of Manbhum-Singhbhum but he exercised powers over all the departments of the local civil courts

including those placed in charge of the Munsif excepting the Munsif's own office. All the staff in the civil court excepting the Munsif's own staff was directly under the Subordinate Judge's control notwithstanding the fact that certain departments were under the supervisory control of the Munsif. By the posting of a full-fledged District Judge at Dhanbad, the position is now at par with other districts. The growing importance of Dhanbad because of her extensive mining and commercial interests and creation of the status of a district the posting of a District Judge was a necessity.

A pertinent question may be asked whether the tendency towards litigation in this sub-district is great or not. It has to be considered by certain figures in this respect. There has been a very rapid increase in population in Dhanbad as sub-district and then as a district. Since 1901 Census figures show that from 1901 to 1911 the increase in its population of the sub-district was 36.6, from 1911 to 1921 a further increase of 18.18. All these increases should have reflected a corresponding increase in litigation but while there was an increase of 56 per cent in two decennial ending in 1910 to 1921 over the figure of 1901 there has been no corresponding increase in litigation regarding immoveable property. The relationship of the population with civil litigation however cannot be pushed too far.

An increase of suits relating to immoveable property is a good index showing whether the people indulged in more litigation or not. There has been a heavy increase in filing of such suits but that can be well explained by the fact that a place of commercial importance is bound to have an increase in the suits relating to money. It may be said that as the increase of population in Dhanbad subdivision was caused more by influx of population from outside in the colliery area while the increase in the indigenous population has not occurred at any period. But this cannot be taken to be altogether correct. There has been a greater birth rate in the indigenous population as well. In spite of that the number of title suits remained almost steady as it will appear from the chart below:—

Year.				Number of title suits.
1901	..	..	..	231
1902	..	..	..	223
1903	..	..	..	193
1904	..	..	..	262
1905	..	..	..	234
1906	..	..	..	229
1907	..	..	..	203
1908	..	..	..	262
1909	..	..	..	266

Year.	Number of title suits.		
1910	255
1911	271
1912	296
1913	303
1914	262
1915	265
1916	229
1917	236
1918	225
1919	275
1920	193

Year.	Munsif's Court.		Sub-Judge's Court.
1921	..	267	93
1922	..	241	84
1923	..	123	163
1924	..	239	88
1925	..	295	81
1926	..	282	95
1927	..	349	73
1928	..	329	87
1929	..	402	67
1930	..	493	82
1931	..	513	64
1932	..	212	48
1933	..	130	152
1934	..	190	44
1935	..	227	44
1936	..	188	45
1937	..	496	46
1938	..	152	48
1939	..	240	44
1940	..	310	48
1941	..	242	48
1942	..	284	47
1943	..	239	56
1944	..	233	59
1945	..	265	64

Year.		Munsif's Court.	Sub-Judge's Court.
1946	..	235	55
1947	..	260	63
1948	..	290	68
1949	..	334	56
1950	..	453	56
1951	..	422	34
1952	..	331	25
1953	..	397	46

From 1921 onwards various facts have contributed towards an irregular increase in the filing from 1927 to 1931. There has been a very substantial increase in the filing of title suits in the Munsif's Court.

Year.		No. of title suits in Sub-Judge's Court.	No. of title suits in Munsif's Court.
1927	..	73	349
1928	..	87	329
1929	..	67	402
1930	..	82	493
1931	..	64	513

But in the Subordinate Judge's Court there was no such increase noted. The reasons are obvious. It was not for a certain craze having seized the people for litigation that a large number of additional suits were filed. Final publications after settlement proceedings have been made in 1925 and all inaccuracy in a settlement record had to be corrected within six years of the date of the final publication. The limitation, extended up to the year 1931 and a large number of title suits were filed in the Munsif's Court in that year being 513. There was a corresponding increase in the filing of money suits in both the courts in these years.

Year.	Money suits.
1901	282
1902	514
1903	615
1904	636
1905	780
1906	650
1907	748
1908	802

Year.	Money suits.			
1909	..	1,318		
1910	..	1,306		
1911	..	1,249		
1912	..	1,191		
1913	..	1,151		
1914	..	1,350		
1915	..	1,351		
1916	..	1,308		
1917	..	1,363		
1918	..	1,041		
1919	..	1,224		
1920	..	976	(Sub-Judge)	469 (Munsif)
1921	..	1,264	"	257 "
				(Munsif had no S. C. C. power.)
1927	..	519	"	1,393 (Munsif)
1928	..	269	"	1,499 "
1929	..	251	"	1,608 "
1930	..	273	"	1,523 "
1931	..	221	"	1,696 "

Money suits.

Year.	Sub-Judge's Court.		Munsif's Court.
1941	..	191	1,140
1942	..	316	626
1943	..	123	815
1944	..	396	680
1945	..	290	445
1946	..	103	428
1947	..	136	403
1948	..	155	490
1949	..	143	685
1950	..	135	593
1951	..	137	640
1952	..	177	718
1953	..	199	761

This also can be accounted for by the fact that these were the heyday of the coal trade and up to 1929 there was brisk business leading to many monetary transactions which necessarily led to an

increase in the number of suits based on these transactions. It is noteworthy that in Subordinate Judge's Court there was no appreciable increase in the number of filings of title suits for a suit for correction of settlement entry would never be valued at a figure which exceeds the jurisdiction of the Munsif. From 1932 filing came back to its normal and in the depression years it even went below the normal being 130 in 1933, 119 in 1934. There was again substantial increase in 1937. But that also was the act of a merely set of circumstances and did not indicate any general tendency towards litigation. In that year big landlords like Raja of Jharia and coal magnates like Rai Bahadur H. P. Banerjee, Mr. D. D. Thacker and K. S. Worah brought a number of suits for assessment of rents on lands which was recorded as *be-lagan* as also *be-lagan-kabil-lagan*. The contentions were that *be-lagan* lands were assessable to rent and the entry merely amounted to this that the lands had not at the period of settlement been assessed to any rent. As 12 years were expiring after the date of final publication the question raised by these parties had to be settled for after that a remedy would probably get barred. It is because of this that suits numbering over two hundred were filed in 1937 in the Munsif's Court at Dhanbad. This was an occasional spurt caused not by any litigious tendency of the people as a whole but by action of the landlords who considered themselves competent to put their own interpretation upon the record-of-rights. A great number of these suits were tried analogously and disposed of on lots by one set of evidence. These have, therefore, no value as showing any tendency. The same remark applies to the spurt in 1951, 1952, 1953 and 1954. Tata Iron and Steel Co. had filed a large number of ejectment suits to put out tenants from areas which they required for their own purpose.

Except occasional spurts in 1923 and 1933 the filings of title suits in the Subordinate Judge's Court have remained steady and considerably decreased from 1934. Prior to that year filing ranged between 93 to 84 and the average can be fixed at 80 to 84. But from 1934 there is a considerable decrease, mostly because of the fact that the powers of the Munsif was raised to Rs. 2,000 and the land values for the suits which could ordinarily be filed in the Subordinate Judge's Court had to be filed in Munsif's Court. This also does not show a special litigious tendency in the people. On the whole the number of title suits filed in any year will show no special tendency towards litigation.

There is another factor from which the general tendency of the litigant public can be ascertained. That is the proportion between the uncontested and contested disposal in a year. The table below will show the proportion between the contested and uncontested disposal and it will appear from it that though there has been an increase in the files, the uncontested disposals have increased over the contested one

Year.			Contested.	Uncontested.
1901	..	..	162	438
1902	..	..	112	216
1903	..	..	127	266
1904	..	..	127	312
1905	..	..	164	759
1906	..	..	116	342
1907	..	..	111	434
1908	..	..	133	401
1909	..	..	114	601
1910	..	..	210	657
1911	..	..	163	549
1912	..	..	173	659
1913	..	..	224	844
1914	..	..	220	824
1915	..	..	188	985
1916	..	..	160	1,311

Year.			Contested.	Uncontested.	Munsif's Court.	
					Contested.	Uncontested.
1930	..	..	56	131	218	362
1931	..	..	67	81	215	406
1932	..	..	88	199	169	362
1933	..	..	78	199	79	139
1934	..	..	31	49	126	292
1935	..	..	24	31	123	294
1936	..	..	28	39	82	199
1937	..	..	27	48	48	383

Sub-Judge's Court.

1938	..	..	51	53	40	245
1939	..	..	23	35	101	254
1940	..	..	27	37	123	211
1941	..	..	32	29	148	303
1942	..	..	26	34	123	332
1943	..	..	18	33	105	291
1944	..	..	40	46	104	276
1945	..	..	37	25	91	262
1946	..	..	57	50	106	664
1947	..	..	45	31	47	156
1948	..	..	51	56	101	218
1949	..	..	34	29	97	241
1950	..	..	28	31	91	328
1951	..	..	36	26	74	320
1952	..	..	39	15	133	470

There is no tendency towards a substantial increase in the number of contested disposals while the uncontested disposals have increased very substantially in many years. The inference that can be drawn from it that though the number of the filings have increased the people are less prone to contest the suit and make compromise or allow the suit to be dismissed or to go *ex parte* by agreement. A very illustrative year is 1916. If it is compared with the figures of 1901 it will be found that in 1901 there were 162 contested disposal while 438 uncontested one. In 1916 there were 160 contested disposal whereas there were 1,311 uncontested one. The proportion of uncontested disposal has increased by three times and even though the number of filings were greater in 1916 than in 1901 that did not show a special tendency towards litigation. One thing has to be noted. The average duration of suits have been steadily increasing and the chart below will show the fact:—

Year.				Number of days occupied in trial.			
				Sub-Judge's Court.		Munsif's Court.	
				Contested.	Uncontested.	Contested.	Uncontested.
1920	..	..	..	349.9	233.9	173.7	133
1921	..	..	..	310.5	197.4	180	131
1922	..	..	..	281.8	203.9	191	137
1923	..	..	..	267.2	176.9	226	147
1924	..	..	..	293.6	115.2	210	139
1925	..	..	..	477.1	236.3	215	129
1926	..	..	..	351.4	187.5	222	127
1927	.	..	..	354.6	163.5	312	156
1928	..	..	..	349	164.1	270	168
1929	..	..	..	420	293	309.8	148.6
1930	.	..	..	374	177.5	364.7	175
1931	..	..	..	389	287	369.3	189.4
1932	..	..	..	428.1	340.4	407.8	240.5
1933	..	..	..	415.4	201.1	344.9	207.3
1934	—	..	..	482.6	264.4	334.6	194.1

				Number of days occupied in trial.			
Year.				Sub-Judge's Court.		Munsif's Court.	
				Contested.	Uncontested.	Contested.	Uncontested.
1935	..	..	..	471.3	308.09	333.2	163.1
1936	..	..	..	513.3	362.3	264.8	168.6
1937	..	..	..	400.8	296.9	386.8	198.8
1938	..	..	..	305.3	288.9	384.1	219.7
1939	..	..	..	376.7	301.6	350.49	243
1940	..	..	..	529.1	384.5	386.88	216.49
1941	..	..	..	436.9	316.7	390	229
1942	..	..	..	482	363.6	473.66	263.21
1943	..	..	..	595.9	480	504.79	251.97
1944	..	..	..	577.5	433	535.06	288.91
1945	..	..	..	576	331.8	555.84	307.55
1946	..	..	..	516.8	513	541.81	321.96
1947	..	..	..	441.8	339	596.72	326.67
1948	..	..	..	457.5	338.5	606.4	302.8
1949	..	..	..	519.9	241.8	456.38	261.8
1950	..	..	..	319.78	147.8	526.08	253.6
1951	..	..	..	462.25	447.8	565.87	309.07
1952	..	..	..	688.5	478.1	707.06	376.90

This, however, does not indicate special litigious tendency but points to the administrative difficulty which necessarily keeps a suit pending. There are various factors contributing to this state of affairs. The strongest single factor, however, seems to be that in some years when special kinds of suits were filed in numbers a large part of filings remains as left over and fresh suits are added in the next year. This goes on till some of the suits have got so old that the average duration tends to increase substantially from what it was in the first decade of the 20th century. Those special suits which remained pending for several years may not be very large in number

but they entered into the calculation of average duration of disposals and substantially increased the figure. The increase of average duration, however, has been a cause of concern of the High Court and in recent years steps have been taken to dispose of as many suits as could be possible within a short period.

The increase in commercial activities has very well been reflected in the increase on the number of suits filed for money and movables. It is noteworthy that since the growth into prominence as centre of the commercial place there has been a sharp increase in the institution of suits relating to money and movables. As the business transactions went on increasing and credit was fluid, this was bound to be so. This increase could not be taken as a circumstance showing a growing tendency of litigation on the part of the people. This was the natural consequence attendant on the increase in the bulk of the credit business, that is the characteristic of a prosperous town, and as the prosperity increases the bulk of the credit business also increases and suits naturally came to be filed in a greater number. This state of affairs continued till 1942. There was, thereafter, a shrinkage of credit which became extremely shy owing to the passing of Money Lenders' Act and also due to the circumstances of a certain amount of nervousness and uncertainty created by the last war. In the First World War India was not very much affected nor was there any possibility of its being directly attacked. Then there was prosperity in business without any nervousness and feeling of uncertainty. The prices shot up very much higher in the Second World War but modern methods of warfare showed that India had become a vulnerable point and not immune from attack as it was in the last war. There was considerable nervousness which made credit shy and the drop in the number of suits in the money movables since after 1942 is accounted for by the fact that credit business was restricted. This has continued to be so till lately and there is no chance that there will be a revival of credit business to any large extent in very near future.

CHARACTERISTIC OF THE TITLE SUITS OF DHANBAD.

Dhanbad title suits are characterised by simplicity of facts and take little time to be disposed of when they are taken up. Often the witnesses have very little to say about their own cases and break under the slightest stress of cross-examination. Most of the suits are based on possession and dispossession and a large number are for partition. The facts involved are not too numerous and the average number of witnesses examined on each side does not exceed four in the less contested one and eight in the more contested one. Even when a custom is alleged the number of witnesses are not many and a lawyer knowing the calibre of the witnesses desist from citing too many who may jeopardise the case rather than to help it. It is probably because the witnesses are so uninstructed and un-instructible that a lawyer of this place has to acquire a sharper legal

acumen in order to defend his position. It is not upon the facts that the cases are fought here but interpretation on the admitted or proved fact is put in such way so that a judgment might be obtained in favour of a party. The lawyers are, therefore, constantly at battle of wits with each other and it is not the parties who fight the cases as in other parts of Bihar but their lawyers who do it. One result has followed. The Bar here is a highly informed Bar, one which hardly could be expected in a new district of this kind. The libraries of the lawyers are very well equipped and there is probably no Bar in this Province which can boast of having a lawyer who has a library not only of the current Indian Authorities and Rulings but also all the English Laws that can be found in a well equipped High Court Library. Whoever has seen the Law Library of Late Mr. G. N. Roy, Advocate and Shri S. C. Banerjee, Advocate will be struck at the collection made at their libraries. There are others who are similarly well equipped in Law Books and Rulings. This has to be so because with the help of this that the lawyers have to fight their battle of wits and make a case for their parties who are absolutely uninformed and uninstructed about their own cases.

In money suits the case is just the reverse. All complications of commercial laws have to be gone into in suits filed on contract in this court. The difficulties have been presented often and at times lawyers from other parts of India had to be brought to argue the complicated commercial laws. That is another reason why possession of English Rulings and English Books are considered to be indispensable in a place like this. As happens in a commercial place cases of Tort are more frequent than any other part of Bihar and that necessitates the Bar being more than ordinarily well informed in English Laws at Dhanbad.

At earlier period cases of encroachment of underground collieries were more frequent than at present. This is but natural for in the earlier days of settlement the acquisitions of boundaries were not precisely put and technical skill was not as high as at present. The encroachments by driving underground galleries into other's properties were not unfrequent and those who encroached and the persons whose lands were encroached upon felt themselves equally within their rights to dispute each other's claim. Serious contest used to be made and specialization in underground right was undertaken by the lawyers of repute such as late Mr. G. N. Roy and late Shri L. K. Mitra. The suits of encroachment have lessened in number as the mineral rights have come more and more to be defined and the leases are more definite nowadays. We have still a few of them every year but their number is not as great as they used to be at a former period. Such suits have certainly been affected by the regulations made by the Mines Department. We can point to the strict enforcement of the regulation that each colliery owner should leave a barrier of 25 feet between his coal lands and the coal lands of adjoining owner. This has practically eliminated the

chance of encroachment, for each of the owners has to leave out 25 feet from their boundaries so that any doubtful working may not occur within the area of the other. Thus a barrier of fifty feet is automatically left between the two collieries. The law relating to joint survey when there is a dispute between two owners has also a similar effect upon suits for encroachment. It is good that all these laws have been enforced. In earlier years when these laws had not been enacted and even though enacted had not been properly enforced there had been litigations lasting for several years between the adjoining colliery owners resulting in loss of production. It is probably due to these facts that in recent years the laws relating to barriers and joint survey has been more strictly enforced with satisfactory results. We cannot afford to lose production at a time when that is the vital need of the country.

There has been some recent legislation which has affected the nature and in some cases their filings also. Passing of the Bihar Money Lenders' Act in 1938 has led to diminution in the number of money suits based on handnotes and loans of various kinds.

The Act affects the money-lenders more. Even in suits based on the handnotes and other loan transactions which are filed, the parties find very little to contest for the Act has clearly defined the rights of the money-lenders as also that of the debtors. Not many points are left to be raised during the contest. The large concessions made in favour of the debtors in the Act itself persuades him to give up contest and pray for instalments and follow the far less expensive methods of meeting the creditor on his own ground. This naturally has led to a diminution in the figures of money suits and since 1942 onwards the figures were considerably lessened. There were other reasons of purely economic nature. Credit shrinks not only because of the Money Lenders' Act but also because of the uncertainty of the times. But at the same time the number of licensed money-lenders is definitely on the increase.

Another recent legislation is the Gram Panchayat Act. It is not predictable at this moment as to what effect will this have upon the litigations in court. So far as *Gram Panchayat* is concerned it had been invested with very little judicial powers to have any considerable effect on the number of filings. *Gram Panchayats* have little or no power to deal the cases in which there is a genuine dispute of title. It can now deal with cases relating to payment of rent or other money claims but if there is a genuine dispute involved regarding title, a suit for decision by the *Gram Panchayat* cannot be filed in the *Panchayat* Court. It can, therefore, be said at once that so far as filing of title suits is concerned, the Gram Panchayat Act cannot be expected to affect this vitally and they will continue to be as many as before. The *Panchayats* are now vested with powers to settle monetary disputes but the powers are too inadequate to produce any large effect on the total number of the filings in the

civil courts. Besides an analysis for the class of cases that have been filed for the last five years will show that an appreciable diminution in the number of filings cannot be expected even if the powers were enlarged.

Year.	Coal.	Railways.	Rent and taxes.	Handnote.	Others.
<i>Munsif's Court.</i>					
1950	31	135	143	135	149
1951	54	146	126	149	165
1952	61	230	98	183	140
1953	82	244	111	177	148
1954	82	154	189	152	121
<i>Subordinate Judge's Court.</i>					
1950	10	46	21	30	28
1951	24	18	38	38	20
1952	20	24	60	45	28
1953	34	23	73	40	26
1954	39	43	34	54	32

From the above analysis it is clear that by far the largest number of filings relate to urban area. We could not have claimed against the Railways or for price of coal in non-industrial or rural areas, neither could we have any claim relating to house rent and municipal taxes from rural areas. Any diminution that can be expected out of the Gram Panchayat Act must relate to rural areas and those areas are found to belong to the latter two classes, that is, those based on handnotes and other miscellaneous accounts. It has to be remembered that out of the suits filed on the basis of the handnotes more than 50 per cent relate to credits contracted in the industrial parts of the sub-district and comparatively few of them relate to village areas where the Gram Panchayat Act is in operation. There can, therefore, be no appreciable diminution in number of filings of money suits as a result of the passing of the Act. What may happen if the powers of the *Panchayat* are enlarged is purely a speculative question. If the intention of the Government is to decentralise the administration of justice in such a way that all matters relating to village disputes are settled in the village itself without reference to law courts, the powers of the *Gram Panchayat*

have necessarily to be increased. But the Government has its difficulty and unless the tone of the *Panchayats* is improved and they are more thoroughly and impartially organised the Government cannot afford to vest them with any large power than at present. Efficient legal training has to be imparted and a feeling is to be created in the people themselves by which it becomes possible for them to rely upon the village organisation for a more correct decision than the law courts. There can be no doubt that if a legal decision is made by an impartial agency in the villages it will conform more to facts and bound to be more equitable than the decision made in the law courts and obtained by all sorts of manoeuvre of lawyers of the contending parties. But this desideratum will remain as a wishful thinking for a pretty long time to come. It has taken several hundred years of unsympathetic foreign rule to corrupt the village morals and the village courts ceased to be reliable and remained infested with village politics and party feelings. Disorganised economy led to its further degradation. The recovery of the former reliability is therefore a matter of not one or two or three Five-Year Plans but may take several decades. Till then the law courts will feel no appreciable influence of the passing of the Gram Panchayat Act.

The next legislation that has to be considered is the Land Reforms Act. In Chotanagpur where the powers of the Deputy Commissioner in revenue matters are very much larger than in Bihar the passing of the Land Reforms Act will have little effect on the number of the civil suits. The rent suits in this area were no concern of the civil courts and was exclusively triable by the Deputy Commissioner or any person authorised by him. The civil litigations will, therefore, be little affected by passing of the Land Reforms Act and also by the abolition of the *zamindari* under it. It will have to be seen that in this area except on occasions the landlords left the tenants in peace. So far as their civil rights were concerned and such of the civil rights that may give rise to dispute between the landlord and tenant are a matter of decision, under the law by the Deputy Commissioner alone. The landlords, therefore, were not fighters of civil litigations. In the revenue side there will of course be a total abolition of rent suits but as a matter of fact, in the *zamindaris* taken over under the Land Reforms Act, the procedure for recovery of rent from the tenant is not adopted. A certificate under the Public Demand Recovery Act serves the purpose of a rent suit for those dues which were dues to the landlord, by one stroke of pen has been converted into a Public Demand and made recoverable by the speedier and probably easier method described under the Public Demand Recovery Act.

Certain consequences are, however, bound to follow: All those classes of cases which relate to a succession to an estate or *zamindar* are eliminated altogether. There will be no further protracted litigation like the Jharia Raj succession case or Pandra succession case. There were several of this kind within the last 50 years and all suits

of this nature which evoked a great enthusiasm and expectation of the Bar are ruled out. But we can reasonably expect an increase of the civil litigations for other reasons. By section 139 of the C. N. T. Act suits of certain kind were made exclusively cognizable by the Deputy Commissioner and the civil court's jurisdiction to entertain them have been barred. Thus if a tenant were to be ejected on the grounds mentioned in the C. N. T. Act a suit for such ejectment has to be filed before the Deputy Commissioner and not in the civil courts. If it were so filed the civil court would at once say that the plaintiff was ill advised in filing the suit before it for he has no powers to deal with the cases of this nature. In the present context a drastic amendment has to be made in the Chotanagpur Tenancy Act enabling the civil courts to entertain such suits. Under the provisions of the Land Reforms Act the proprietor ceases to have any right and all the rights are now vested in the estate. In the district the Deputy Commissioner represents the State and is in the position of the landlords. If he had an occasion to bring a suit against the tenant for ejectment from the holding on the ground mentioned in the Chotanagpur Tenancy Act there is no court in which he can bring such a suit. It will be anomalous to think that the Deputy Commissioner will sue the tenant before himself and make a decision also. The position has not arisen so far, and serious thought does not seem to have been bestowed in this aspect of the law or else a drastic amendment of the provisions of the Chotanagpur Tenancy Act would by this time have been in the anvil.

It may be that so far as smaller tenants are concerned the Government is not aware and not sufficiently alert because their ejectment on any ground is not under their contemplation but by the very Act itself a class of more powerful tenant who may prove to be recalcitrant and obdurate has been created. The *zamindars* had been left in possession of their private lands and *nij jote lands* and they are to be considered as tenant under the Chotanagpur Tenancy Act. Clashes are bound to occur between these disgruntled *zamindars* and the Government and in such circumstances suits may become inevitable. If under such circumstances the *zamindar* is left with the plea that the Deputy Commissioner representing the Government had brought the suit before himself and decided as he liked something against the fundamental principles of justice will appear to be done. In this context the drastic amendment of the C. N. T. Act has become necessary empowering the civil authorities to entertain suits of this nature.

There are other such instances which can be cited. But a discussion about that is not within the scope of a text like this. It suffices to say that sooner or later the Act is bound to be amended in such a way as to enlarge the powers of the civil court to entertain the dispute between the landlords and tenants, landlords being now the State Government. The question, whether there will be an increase in the number of filings when the Act is so amended is a question

which is purely speculative but it can be said without much hesitation that classes of suits which formerly were tried by the Deputy Commissioner will begin to be dealt by the civil courts in these areas.

On the whole the civil courts have been lucrative for the Government and contribute considerable amounts to the Exchequer. The income has far outstripped the expenditure incurred for maintenance of the law courts in this sub-district.

Chart showing income and expenditure.

Year.	Subordinate Judge's court.		Munsif's court.	
	Income.	Expenditure.	Income.	Expenditure.
	Rs. a p.	Rs. a p.	Rs. a p.	Rs. a p.
1944	95,277 12 0	23,708 13 0	32,314 14 0	..
1945	50,971 4 0	25,575 14 9	30,957 7 0	..
1946	40,268 4 0	20,600 1 9	32,350 0 0	9,150 4 0
1947	75,434 0 0	35,769 10 0	33,800 0 0	10,287 7 0
1948	70,301 0 0	31,056 6 10	42,559 6 0	9,835 0 0
1949	1,13,070 0 0	30,993 7 0	62,640 15 0	9,775 0 0
1950	92,817 4 0	36,408 7 8	69,097 14 0	9,823 0 0
1951	71,974 4 0	36,152 12 0	81,028 1 0	10,969 5 0
1952	69,742 13 0	43,710 8 8	89,264 11 0	11,450 13 0
1953	1,29,840 14 0	43,103 0 0	96,843 6 0	11,810 0 0

Looking into the figures one may entertain a feeling that the courts are more in the nature of a commercial undertaking, a means of extracting revenue, than for dispensation on maintenance of the standard of justice. But this feeling is not justified judging by the standard of work done in the law courts. Till this time the public have refused to submit to any arbitration than that of the civil courts, in cases where a genuine dispute between the two parties had arisen. Attempts are made from time to time to refer the matter in dispute before the civil courts to arbitration under the amended Arbitration Act. More often than not the award of the arbitrators are impugned by the parties themselves in the civil courts and not until a pronouncement has been made by it that the parties are satisfied. This shows that the remedies obtained in the civil courts are far more equitable than what a party

could have expected in an outside arbitration. It is, therefore, that the party sticks to the civil courts even though the costs of such sticking is larger.

We have to observe that effects of one of the most recent legislation will have upon the course of litigations in this district. That legislation is Mineral Concessions Rules. The enactment will not influence the number of filings but may give rise to certain class of litigations directly and indirectly. There is a provision in the rules that a permission has to be obtained where a new settlement of the mineral lands are made. This permission for working a virgin land is termed a certificate of approval which has to be obtained either from the Local or Central Government. Much difficulty will not be created in cases of new leases for by the Land Reforms Act all mineral rights vested in the landlords will vest in the State Government and wherever a settlement of virgin land is made the same authority which makes the settlement will also grant the certificate of approval. The difficulty has been created in case of approval in case of transfer of old leases and almost in every case a certificate of approval is demanded by the Railways who have made it a pre-condition for extending the Railway facilities to the new purchasers that they should produce a certificate of approval as prescribed under the Mineral Concessions Rules. It is not yet clear whether the certificate of approval is necessary in cases of transfer of leases created prior to 1948. Yet as a matter of fact the Railways have been demanding certificate of transfer either from the Central Government or from the State Government for the transfer of old leases also. The idea behind the enactment was to prevent the transfer of coal properties to persons who have little knowledge of scientific extraction of coal and damage the property more than they do real extraction. It was in the interest of national savings that the enactment was passed and probably it is under that spirit that it is being worked and the Railways have been demanding certificates of approval in cases of all transfers though it is not clear still whether certificate of approval is necessary in cases of transfer of old leases. Now a certificate of approval is not a very easy thing to obtain. Sometimes months and years elapse before it comes up for consideration before the authorities granting the certificate and an application remains unattended for a pretty long time. It is to avoid this vexatious delays that a new form of contract is coming into being which we call the managing agency contract. An out and out lease or sale document is not executed. The lease holder of the property does not himself work it but agrees to let it out to somebody else who provide for the finance, with a stipulation that in case he wants to get into the property himself he will do so after a notice. Till then the lessee and his assigns bind themselves to permit the man contracting to pay a lump sum amount or a commission on tonnage basis, that they shall continue to work the colliery and be in possession of it. It is contended in many cases that this was not a transfer of property, and therefore, did not attract the operation of the

Mineral Concessions Rules. Now this kind of contract has been a subject-matter of interpretation in dispute arising between the parties in more recent times. What they actually are is a matter of controversy and in many cases it has been held that they are in the nature of a lease under section 106 of Transfer of Property Act. The point has not been finally settled as yet and even if in some cases it might have been held that they are leases all the various forms under which such a contract can be entered into has not been subject-matter of serious consideration up to this date. In this class of cases a court will be called upon to decide what this particular mining contract is whether fish or flesh or good red herring.

We have now to consider about the court language. There is a letter from the Government showing that in the year 1913 when this province was first created, Hindi was made an optional court language of this sub-district. Prior to that all the transactions used to be run and all pleadings and petitions were filed in Bengali or in exceptional cases in English. The deposition as now continued to be taken in English. In an earlier period that is in the early of 18th century Bengali was in extensive use and even judgments and order-sheets used to be written in Bengali. The introduction of the Hindi as an alternative court language from 1913 did not have much effect and not even the .05 per cent of the petitions or pleadings were filed in Hindi in this court. English progressively came to be used more and more in the pleadings relating to encroachment and disputes regarding collieries. The lawyers thought that English was a safer language so far as precision and clarity were concerned and avoided any vernacular which might lead to a verbose and confusion. This state of things continued up to the year 1948 when the Bihar Government abolished one of the three court languages and ordered that the business of the court shall be transacted either in English or in Hindi written in Devnagri script. What the Bihar Government expected is not very clear but the results have not been encouraging from a national standpoint. The only consequence that has followed from promulgation of such an order is that all vernaculars have been replaced by English. There is hardly one pleading in the court in every three hundred which is couched in the Hindi language. Not even 1 per cent of the petitions is filed in Hindi. It will appear to be somewhat strange how this happened to be so and would go to suggest a retrogression towards pro-British tendency at a period when India has attained her independence. But the reason for this retrogression is not far to seek. The lawyers who have to deal with the court language and their clerks find it difficult to adopt themselves to Hindi which they do not know and have not been trained to use in the courts. Law is a very technical subject and use of inappropriate language in pleadings may lead to serious consequences in the litigation itself. A set of people not trained to use the language will, therefore, naturally use the caution of avoiding it and use that one in which he thinks he will be more correct

and appropriate. It is, therefore, with no feeling of love that English is adhered to by the local Bar. It is under the sheer necessity and compulsion that they have almost discarded all vernaculars and stick to English in the present set up.

If Bengali were allowed to be used as it was being used before 1948 a fair percentage of the pleadings and petitions may again come to be filed in Bengali, a language to which the lawyers and their clerks were once used. But if Hindi continues to be the sole Indian language to be used in courts along with English, Hindi has a little chance to make a headway in the near future. The only method by which the language of the law courts could be Hindized was to prohibit English altogether but that would seem to be too drastic a step. One feels that the Government had only introduced Hindi in the above manner not with any political motive but for the sake of a uniformity of court language as far as practicable. Bengali was retained as the court language only in those areas where it was inevitable and its very retention on those parts discharges the Government from any accusation of political bias. If they had been under any it would have been their intention to introduce it at all costs in all places. As it now stands the Indian Constitution had directions to replace English by Hindi within 15 years and it is in pursuance of that direction that the State Government acted in the hope that Hindi would be popularised within that period. At present the court diary and cause lists and certain other documents are maintained throughout the State in Hindi. Correspondence is not still done in Hindi but steps are being taken towards that. In this context it is desirable that Hindi be adopted as language of the plaint, written statement as also the petitions. It seems to be necessary to devise a means by which a political bias is altogether dislodged from a section of the lawyers and provide facilities to those who refrain from using it from sheer necessity (because of their ignorance of the language) for gradually learning up and begin to use it in the courts. Observers will find that almost every one will fall in line with the view that sooner or later it is desirable to have Hindi as the official language for India and that it should be used in courts in place of English. Some how or other this opinion has not exerted an influence upto now. One of the main blocks of such exertion is political bias amongst the section of the Bar in favour of the Bengali. It may be hoped in near future this bias will disappear and people gradually will take to Hindi to that the unseemly spectacle of regional vernacular having been replaced by the English will disappear.

CIVIL JUSTICE IN 1960.

The report on the administration of civil justice in Dhanbad district for the year 1960 will indicate the latest position and a summary is given below.

The districts of Dhanbad and Singhbhum were constituted as separate judgeships with their headquarters at Dhanbad and Chaibasa with effect from the 4th February, 1960 under Government notification nos. 584-J and 585-J, dated the 25th January, 1960.

The permanent Subordinate Judicial staff in the judgeship of Dhanbad-Singhbhum consisted of three Subordinate Judges, two at Dhanbad and one at Jamshedpur, one Deputy Collector at Chaibasa vested with the powers of a Subordinate Judge, three regular Munsifs, two at Dhanbad and one at Jamshedpur, and two Deputy Collectors vested with the powers of Munsifs, one at Chaibasa and the other at Seraikela.

An Additional Subordinate Judge was employed at Dhanbad from the beginning of the year till 3rd February 1960.

Two Additional Munsifs were employed at Dhanbad, one from the beginning of the year and the other from 18th January, 1960 till 3rd February, 1960, and four Additional Munsifs were employed at Jamshedpur, two from the beginning of the year, one from 12th January, 1960 and the remaining one from 16th January, 1960 till 3rd February, 1960.

The seniormost Subordinate Judge at Dhanbad was vested with special powers for the disposal of succession certificate cases under Government notification no. 36-J, dated the 3rd January, 1958. He was also vested with jurisdiction in insolvency cases arising in the district of Dhanbad in which the debts mentioned in the insolvency petition do not exceed Rs. 5,000 under Government notification no. 37-J, dated the 3rd January, 1958. Both the Subordinate Judges of Dhanbad were vested with powers of an Assistant Sessions Judge in sessions division of Dhanbad-Singhbhum.

The Subordinate Judge of Singhbhum exercised special powers for the disposal of succession certificate cases and insolvency cases in which debts mentioned in the insolvency petition did not exceed Rs. 5,000 arising within the district of Singhbhum. He also exercised powers under the Bengal Regulation V of 1799 within the district of Singhbhum. He was vested with powers of an Assistant Sessions Judge in the sessions division of Dhanbad-Singhbhum.

The permanent Munsifs at Dhanbad and Jamshedpur exercised powers for trial of original suits up to the value of Rs. 4,000 and exercised Small Cause Court powers up to the value of Rs. 250.

The two permanent Subordinate Judges and two permanent Munsifs at Dhanbad exercised the same powers in the Judgeship of Dhanbad with effect from 4th February, 1960 till the end of the year as they were exercising in the Judgeship of Dhanbad-Singhbhum.

An Additional Subordinate Judge was employed in the Judgeship of Dhanbad with effect from 4th February, 1960 till 10th April, 1960 and two Additional Munsifs were employed in the Judgeship from 4th February, 1960 till the end of the year.

Original suits.—The number of original suits instituted during the year under review was 359 in the Judgeship of Dhanbad-Singhbhum and 1,184 in the Judgeship of Dhanbad as against 3,783 in 1959 in the Judgeship of Dhanbad-Singhbhum.

The value of suits instituted during the year under report amounted to Rs. 5,00,475 in the Judgeship of Dhanbad-Singhbhum and Rs. 15,48,941 in the Judgeship of Dhanbad as against Rs. 33,04,253 in 1959 in the Judgeship of Dhanbad-Singhbhum.

The number of suits instituted during the year (1,543, viz., 359 in Dhanbad-Singhbhum and 1,184 in Dhanbad) added to the number pending from the previous year (3,614) and to the number revived or otherwise received during the year (44, viz., 3 in Dhanbad-Singhbhum and 41 in Dhanbad) gave a total of 5,201. Thus the total number of suits for disposal in 1960 was 5,201 as against 7,051 in 1959 in the Judgeship of Dhanbad-Singhbhum. Out of the total number of suits, viz., 5,201 and 327 suits were disposed of in the Judgeship of Dhanbad-Singhbhum and 1,297 suits were disposed of in the Judgeship of Dhanbad, 16 suits were transferred to the District Judge of Singhbhum, 2,206 suits related to the subordinate courts of Singhbhum and 1,355 suits remained pending in this judgeship at the close of the year under review as against 3,614 in 1959 in the Judgeship of Dhanbad-Singhbhum.

Of the total number of suits disposed of (1,624), eight suits were disposed of by the District Judge (two in the Judgeship of Dhanbad-Singhbhum and six in the Judgeship of Dhanbad), 320 suits were disposed of by the Subordinate Judges, viz., 86 in Dhanbad-Singhbhum and 234 in Dhanbad out of which 24 and 114 suits were tried under the ordinary procedure and 62 and 120 suits were tried under the powers of the Court of Small Causes in the Judgeship of Dhanbad-Singhbhum and Dhanbad respectively, and 1,296 suits were disposed of by the Munsifs, viz., 239 in Dhanbad-Singhbhum and 1,057 in Dhanbad out of which 196 and 812 suits were tried under the ordinary procedure and 43 and 245 suits were tried under the powers of the Court of Small Causes in the Judgeships of Dhanbad-Singhbhum and Dhanbad respectively. Out of 478 suits decided on contest, viz., 74 in Dhanbad-Singhbhum and 402 in Dhanbad, 354 suits (or 74.05 per cent) ended in favour of the plaintiffs and 124 suits (25.75 per cent) ended in favour of the defendants as against 621 suits (or 81.07 per cent) and 145 suits (or 18.93 per cent) respectively in the year 1959. Of the contested one suit was tried by the District Judge, 122 suits (18 in Dhanbad-Singhbhum and 104 in Dhanbad) were tried by the Subordinate Judges and 355 suits (58 in Dhanbad-Singhbhum and 297 in Dhanbad) were tried by the Munsifs. The number of suits decreed *ex parte* was 387 (71 in Dhanbad-Singhbhum and 316 in Dhanbad) as against 982 in 1959 in Dhanbad-Singhbhum Judgeship. The number of suits decided on admission of claim was 20 (one in Dhanbad-Singhbhum and 19 in Dhanbad) as against 46 in 1959. The number of suits disposed

of on compromise was 363 (87 in Dhanbad-Singhbhum and 276 in Dhanbad) as against 961 in 1959. The number of suits decided on reference to arbitration was one in Dhanbad-Singhbhum as against one in 1959. The number of suits disposed of without trial was 375 (91 in Dhanbad-Singhbhum and 284 in Dhanbad) as against 681 in 1959.

There were 20 suits, pending over three years, viz., seven in the Court of 1st Subordinate Judge, six in the Court of the 2nd Subordinate Judge, three in the Court of the 1st Munsif, two in the Court of the 2nd Munsif and two in the Court of the 1st Additional Munsif, Dhanbad.

Miscellaneous Judicial cases.—The number of Miscellaneous Judicial cases instituted during the year under report was 87 in Dhanbad-Singhbhum and 442 in the Judgeship of Dhanbad as against 996 in 1959 in the Judgeship of Dhanbad-Singhbhum. The number of Miscellaneous Judicial cases instituted during the year (529) added to the number pending from the previous year (501) and to the number revived or otherwise received, viz., three in Dhanbad gave a total of 1,033. Thus the total number of Miscellaneous Judicial cases for disposal in 1960 was 1,033 as against 1,646 in 1959 in the Judgeship of Dhanbad-Singhbhum.

Miscellaneous Non-Judicial cases.—The number of miscellaneous cases of non-judicial nature instituted during the year was four in the Judgeship of Dhanbad as against 21 during the year 1959 in the Judgeship of Dhanbad-Singhbhum.

Insolvency cases.—The number of insolvency cases instituted during the year under report was 13 (eight in Dhanbad-Singhbhum and five in Dhanbad) as against 174 during the year 1959 in the Judgeship of Dhanbad-Singhbhum. 123 cases remained pending at the close of the previous year. There were thus 136 cases for disposal, during the year 1960. Out of 136 cases for disposal, 22 cases (18 in Dhanbad-Singhbhum and four in Dhanbad) were disposed of, 67 cases were transferred to the District Judge of Singhbhum, 42 cases related to the court subordinate to district court in Singhbhum and five cases remained pending at the close of the year.

Appeals.—The number of appeals preferred during the year under report was 200 (13 in Dhanbad-Singhbhum and 187 in Dhanbad) as against 227 in 1959 in the Judgeship of Dhanbad-Singhbhum. 288 appeals remained pending at the end of the previous year and 14 appeals (six in Dhanbad-Singhbhum and eight in Dhanbad) were otherwise received during the year. There were thus 502 appeals for disposal during the year under report. Out of 502 appeals for disposal, 152 appeals (22 in Dhanbad-Singhbhum and 130 in Dhanbad) were disposed of, 19 appeals were transferred to the District Judge of Singhbhum, 177 appeals related to the Courts of the Subordinate Judge in Singhbhum and 214 appeals remained

pending at the close of the year. The number of appeals disposed of was 152 as against 248 in 1959 in the Judgeship of Dhanbad-Singhbhum.

Miscellaneous appeals.—The number of miscellaneous appeals instituted during the year under report was 50 (9 in Dhanbad-Singhbhum and 41 in Dhanbad) as against 116 in 1959 in the Judgeship of Dhanbad-Singhbhum. 79 appeals remained pending at the end of the previous year and one appeal otherwise received during the year. There were thus 130 appeals for disposal during the year under report. Out of 130 appeals for disposal, 63 appeals (nine in Dhanbad-Singhbhum and 54 in Dhanbad) were disposed of, 31 appeals were transferred to the District Judge of Singhbhum, 24 appeals related to the Courts of the Subordinate Judges of Singhbhum and 12 appeals remained pending at the close of the year.

Execution cases.—There were 3,975 cases for disposal during the year under report as against 5,663 cases during 1959 in the Judgeship of Dhanbad-Singhbhum. Out of 3,975 cases for disposal, 932 cases (223 in Dhanbad-Singhbhum and 709 in Dhanbad) were disposed of, 2,370 cases related to the subordinate courts in the district of Singhbhum and 673 cases remained pending at the close of the year as against 3,162 at the close of 1959 in the Judgeship of Dhanbad-Singhbhum. Out of 223 cases disposed of in Dhanbad-Singhbhum, full satisfaction was obtained in 37, partial satisfaction was obtained in 106 cases and in 80 cases the proceedings were infructuous. Out of 709 cases disposed of in Dhanbad, full satisfaction was obtained in 203 cases, partial satisfaction was obtained in 128 cases and in 378 cases the proceedings were infructuous.

Court building.—The construction of the new Civil Court building was taken up and has since been completed.

Commissions and Commissioners.—The total number of commissions issued during the year under report in which knowledge of surveying was required 95 as against 122 in 1959. All these commissions were issued to pleaders holding certificate of proficiency in surveying.

PANCHAYAT ADALATS.

There are no *Panchayat* courts in this district under section 6 or section 7 of the Village Administration Act, 1922. A large number of *Gram Cutcheries* are, however, functioning in this district under the Bihar Panchayat Raj Act, 1947. The *Gram Cutcheries* are expected to bring about an amicable settlement in every suit between the parties first; failing which they are to proceed to give their decision on merit. Secondly, it may be mentioned that the *Gram Panchayats* are established to bring the disposal of justice to the litigants as near their doors as possible at the cheapest possible cost and to bring about as many compromises as possible. Lawyers are not normally allowed and the judges consist of the co-villagers who are commissioned to bring

about as many compromises as possible. According to recent amendment, lawyers are allowed in some cases. The Bihar Panchayat Raj Amendment and Validating Act, 1959, section 55 (amendment of section 71 of Bihar Act VII of 1948) runs as follows:—

“No legal practitioner or person declared or known to the *Gram Cutchery* to be a tout shall appear, plead or act on behalf of any party in any suit or case before the benches thereof. Provided that a person who is arrested shall have the right to consult and to be defended by a legal practitioner of his choice.”

It was thought that the witnesses would be more inclined to depose truthfully in a *Panchayat* court. It was also expected that the proper functioning of the *Panchayat* court would ease the congestion of cases in the court of Magistrates. These aims have not been fulfilled. On the other hand it has been found that the election of *Mukhia*, members of the *Panchayat* and the *Sarpanch* is always preceded or followed by tensions and the tensions continue and effect the working of the *Panchayats* to some extent.

The *Gram Cutchery*, the judiciary of the *Gram Panchayat* is headed by the *Sarpanch* who is elected by adult suffrage. The *Gram Cutchery* is vested with the powers of a Third Class Magistrate. It is also vested with the civil powers to dispose of petty suits. Regarding the criminal powers of a bench of the *Gram Cutchery*, the Bihar Panchayat Raj Amendment and Validating Act, 1959, section 46 (substitution of new section for section 63 of Bihar Act VII of 1948) runs as follows:—

“(1) A bench of the *Gram Cutchery* may pass the following sentences, namely:—

(a) Bench of the *Gram Cutchery* of the *Pratham Varga Gram Panchayat* or *Dwitiya Varga Gram Panchayat*—

(i) Simple imprisonment for a term not exceeding one month.

(ii) Fine not exceeding one hundred rupees and in default of payment of the fine, simple imprisonment for a term not exceeding 15 days.

(b) Bench of the *Gram Cutchery* of the *Tritiya Varga Gram Panchayat*—

Fine not exceeding fifty rupees and in default of payment of the fine, simple imprisonment for a term not exceeding seven days.

(2) When any person is sentenced to imprisonment by a bench of the *Gram Cutchery*, the bench may, if the convicted person satisfies the bench that he intends to present an appeal, order that he

be released on bail for a period sufficient in the opinion of the bench to enable him to present the appeal and obtain the orders of the full bench of the *Gram Cutchery* under section 67 and the sentence of imprisonment shall, so long as he is so released on bail, be deemed to be suspended."

The *Sarpanch* has certain emergency powers in case of apprehension of breach of peace (*vide* section 64 of Bihar Gram Panchaya Act). In trial of cases he is assisted by a panel of *panches* consisting of four elected and four nominated *panches*. One *panch* each is nominated by the contestants and two other *panches* are nominated by the *Sarpanch*. They all derive their powers under a Statutory Act. The *Gram Sevak*, a paid employee of the *Gram Panchaya* acts as a bench clerk. So far as the administration of justice is concerned, these courts are under the general supervision of the District Judge and the Munsif of competent jurisdiction in respect of civil cases and the Subdivisional Officer in respect of criminal cases. The Statement given below will show the statistics of the working of the *Gram Cutcheries* from 1954-55 to 1960-61:—

LEGAL PROFESSION AND BAR ASSOCIATION.

The legal profession consists of Barristers, Advocates, Pleaders and *Mukhtears*. At present there is no Barrister in the district. There are 21 Advocates, 56 Pleaders and 15 *Mukhtears* in the whole of district. There are about twenty-eight more Pleaders who are not members of the Bar. Both the Bar Association and *Mukhtear* Association were established in 1916 at Dhanbad and have their own buildings. There is no further recruitment to the category of *Mukhtears*.

Dhanbad was previously within Govindpur subdivision of the district of Manbhum. With the growing importance of Dhanbad as an important Railway centre and on account of the development of the Jharia Coalfield and the establishment of the office of the Chief Inspector of Mines in India, the subdivisional headquarters was shifted from Govindpur to Dhanbad in or about the year 1907.

The lawyers who were practising at the time in the courts at Govindpur consequently shifted to Dhanbad. There were Pleaders and *Mukhtears*. They formed the nucleus of the Dhanbad Bar Association which was started in 1908 with a membership of about 12 and late Sri J. C. Mallik was the first President of Dhanbad Bar Association and he continued as such till his death in 1939.

The establishment of a Subordinate Judge's Court at Dhanbad in 1917 marked a new epoch in the history of the legal profession at Dhanbad. Important colliery suits regarding underground encroachment on valuable coal land and regarding titles to coal land which were being hitherto filed and tried in the Subordinate Judge's Court at Purulia came to be filed and tried at Dhanbad. This new field attracted some lawyers from Purulia some of whom shifted their practice from Purulia to Dhanbad.

The important civil and criminal litigations in Dhanbad had always attracted lawyers from Calcutta, Burdwan and Patna to Dhanbad. Brilliant legal luminaries from Patna and Calcutta like Sayed Hasan Imam, Ali Imam, P. R. Das, Dr. P. K. Sen, Rash Behari Ghose, N. N. Sarkar, Ashoke Roy, Mr. K. B. Dutt and others had appeared from time to time in the courts at Dhanbad. Some of the celebrated case-load on mining matters have been established because of the litigations in Dhanbad. In the recent years the Industrial and Labour Tribunals at Dhanbad constituted by the State and the Centre have given a good field to a section of lawyers both local and from outside.

Dhanbad was raised to the status of a district in October, 1956, and there was influx of some lawyers from outside.

The relationship between the Bar and the Bench has also been very cordial and judicial officers posted at Dhanbad have been unanimous in their appreciation about the useful help and co-operation they have received from the local members of the legal profession.

Besides the Bar Association Library which has a fair collection of Law Book and Report, some of the members have got their own libraries which consist of important and rare books and valuable law reports.

It may be mentioned here that for conducting criminal cases on behalf of the State a separate cadre for police officers has been created known as District Prosecutor and Assistant District Prosecutor.

The contributions of the Bar for the development of the civil and cultural life of Dhanbad and its neighbourhood have been very considerable. It is not possible to mention all of them. The first President for the Dhanbad Bar Association, Sri J. C. Mallick was the Chairman of Dhanbad Municipality for a number of years and was also the Secretary of Dhanbad H. E. School founded in 1910. Another prominent member of the Bar Sri Guncendra Nath Rai was the founder Secretary of the Abhaya Sundari Girls' H. E. School. The present President of the Bar Association Sri K. N. Bhattacharjee is one of the founders of the Indian Colliery Owners' Association. Another prominent member Sri S. C. Banerjee is the Secretary of two Degree Colleges at Dhanbad. Some of the members have served extremely well in the Legislature, Senate and Syndicate of the Universities.

Their contribution to Freedom Movement has also been considerable. Some of them not only took the leading part in organising the district for the struggle by personal labour but they also contributed substantially to the funds raised by the Congress and other parties. The labour movement and Trade Unionism in Dhanbad district owe a lot to the members of the Bar.

Statistics of the civil justice from 1944 to September, 1961 are given in pages (120—128). Separate figures of appeals and cases which lay to the District Judge not having been maintained could not be furnished.

TABLE I.

Showing institution suits from 1961-1963.

Name of court.	Year.	Class of suits.	Number.	Value.
				Rs.
Munsif's Court, Gobindpur	1961	Title	231	
		Money and Mortgages	282	
			513	57,202
Ditto	1962	T.	223	
		M.	514	
			737	76,845

Name of court.	Year.	Class of suits.	Number.	Value.
				Rs.
Junsif's Court, Gobindpur	.. 1903	T. 193 M. 615	808	84,735
Ditto	.. 1904	T. 262 M. 636	898	97,147
Ditto	.. 1905	T. 234 M. 780	1,014	1,14,149
Ditto	.. 1906	T. 229 M. 650	879	1,01,539
Ditto	.. 1907	T. 293 M. 748	1,041	1,13,447
Junsif's Court, Dhanbad	.. 1908	T. 262 M. 802	1,064	1,30,679
Ditto	.. 1909	T. 266 M. 1,318	1,584	1,96,702
Ditto	.. 1910	T. 3+252 M. 111+1,195	114+1,447	14,644+ 1,78,092
Ditto	.. 1910	T. 255 M. 1,306	1,561	1,92,736
Ditto	.. 1911	T. 271 M. 1,249	1,520	1,90,255
Ditto	.. 1912	T. 294 M. 1,191	1,485	2,11,295
Ditto	.. 1913	T. 303 M. 1,151	1,454	1,69,815
Ditto	.. 1914	T. 262 M. 1,350	1,612	2,17,222

Name of court.	Year.	Class of suits.	Number.	Value.
				Rs.
Munsif's Court, Dhanbad	.. 1915	T. 205 M. 1,351	1,616	2,33,783
Ditto	.. 1916	T. 229 M. 1,308	1,537	2,00,334
Sub-Judge's Court, Dhanbad	.. 1917	T. 30 M. 164	194	59,942
Munsif's Court, Dhanbad	.. 1917	T. 206 M. 1,199	1,405	2,23,448
Sub-Judge's Court, Dhanbad	.. 1918	T. 225 M. 1,041	1,266	14,35,857
Ditto	.. 1919	T. 275 M. 1,224	1,499	10,57,121
Ditto	.. 1920	T. 193 M. 976	1,169	14,43,472
Ditto	.. 1921	T. 93 M. 1,264	1,357	53,10,930
Ditto	.. 1922	T. 84 M. 1,477	1,561	15,91,000
Ditto	.. 1923	T. 163 M. 1,338	1,501	31,93,529
Ditto	.. 1924	T. 88 M. 1,141	1,220	2,07,008
Ditto	.. 1925	T. 81 M. 859	940	18,15,638
Ditto	.. 1926	T. 95 M. 722	617	16,03,533

Name of court.	Year.	Class of suits.	Number.	Value.
				Rs.
Sub-Judge's Court, Dhanbad ..	1927 ..	T. 73 M. 519	592	28,73,229
Ditto ..	1928 ..	T. 87 M. 269	356	24,53,009
Ditto ..	1929 ..	T. 67 M. 251	318	16,72,327
Ditto ..	1930 ..	T. 82 M. 273	355	24,94,179
Ditto ..	1931 ..	T. 64 M. 221	285	10,29,453
Ditto ..	1932 ..	T. 48 M. 303	351	18,28,824
Ditto ..	1933 ..	T. 152 M. 876	1,028	12,80,754
Ditto ..	1934 ..	T. 44 M. 607	651	10,20,839
Ditto ..	1935 ..	T. 44 M. 595	639	6,69,473
Ditto ..	1936 ..	T. 45 M. 482	527	12,83,973
Ditto ..	1937 ..	T. 40 M. 170	222	15,28,541
Ditto ..	1938 ..	T. 48 M. 159	207	7,41,988
Ditto ..	1939 ..	T. 44 M. 173	217	11,90,703

Name of Court.		Year.		Class of suits.		Number.	Value.
							Rs.
Sub-Judge's Court, Dhanbad		1940	..	T.	48	258	5,01,309
				M.	210		
Ditto		1941	..	T.	48	230	7,01,619
				M.	191		
Ditto		1942	..	T.	47	363	12,36,804
				M.	316		
Ditto		1943	..	T.	56	179	13,60,406
				M.	123		
Ditto		1944	..	T.	59	455	9,21,011
				M.	396		
Ditto		1945	..	T.	64	354	8,31,008
				M.	290		
Ditto		1946	..	T.	55	158	12,42,626
				M.	103		
Ditto		1947	..	T.	63	199	13,22,847
				M.	136		
Ditto		1948	..	T.	68	223	17,69,376
				M.	155		
Ditto		1949	..	T.	56	199	19,04,980
				M.	143		
Ditto		1950	..	T.	56	191	26,97,638
				M.	135		
Ditto		1951	..	T.	34	171	7,43,765
				M.	137		
Ditto		1952	..	T.	25	202	7,82,869
				M.	177		
Ditto		1953	..	T.	46	245	17,21,559
				M.	199		

TABLE II.
Showing contested and uncontested disposals and average duration.

Year.	Con- tested.	Average duration.	Uncon- tested.	Average duration.	Con- tested.	Average duration.	Uncon- tested.	Average duration.
1	2	3	4	5	6	7	8	9
<i>Munsif's Court, Gobindpur.</i>								
1901 ..	162	68.1	438	48.4	7	71.7	41	69.5
1902 ..	112	61.4	216	67.2	117	36.07	282	30.2
1903 ..	127	121.07	266	76.6	133	35.9	326	34.4
1904 ..	127	104.1	312	80.9	144	35.1	364	29.8
1905 ..	104	120.5	750	71.09	29	57.06	120	30.3
1906 ..	116	157.5	342	85.5	73	37.5	371	27.8
1907 ..	111	176.6	434	82.7	67	44.07	450	30.5
<i>Munsif's Court, Dhanbad.</i>								
1908 —	133	192.8	401	115.5	84	45.6	459	35.6
1909 ..	114	211.4	601	105.8	205	47.7	691	37.9
1910 ..	210	134.1	657	83.7	199	38.8	437	37.8
1911 ..	103	164.7	549	102.5	207	40.7	668	34.7
1912 ..	173	158.4	659	60.0	136	44.4	487	32.6
1913 ..	224	219.9	844	92.9	64	65.6	330	39.04
1914 ..	220	207.4	824	95.09	72	62.5	486	32.1
1915 ..	188	211.7	985	98.4	50	74.3	255	39.7
1916 ..	100	318.8	1,311	112.9	..	..	..	..
1917 ..	138	300.4	801	135.1	55	195.6	434	75.9
<i>Sub-Judge's Court, Dhanbad.</i>								
1917 ..	10	364.0	31	234.1	38	212.7	114	129.6
1918 ..	80	313.2	208	206.8	170	192.2	666	95.6
1919 ..	08	303.6	129	188.1	186	101.7	711	74.5
1920 ..	40	349.9	87	233.9	138	106.9	498	77.7
1921 ..	66	310.5	98	197.4	233	95.6	892	127.1
1922 ..	75	281.9	144	203.9	324	75.9	1,044	65.3
1923 ..	99	267.3	196	176.9	131	91.3	1,038	61.3

Year.	Con- tested.	Average duration.	Uncon- tested.	Average duration.	Con- tested.	Average duration.	Uncon- tested.	Average duration.
1	2	3	4	5	6	7	8	9
1924 ..	60	293.6	301	115.2	122	157.8	538	83.4
1925 ..	82	477.1	105	236.3	112	146.0	609	82.9
1926 ..	74	351.4	247	187.5	115	137.0	702	81.3
1927 ..	69	354.6	156	163.5	62	104.8	433	83.7
1928 ..	54	349.0	133	164.1	55	117.2	342	39.9
1929 ..	58	420.0	64	293.0	46	127.0	175	81.0
1930 ..	56	374.0	131	177.5	54	141.6	304	85.3
1931 ..	67	389.0	81	287.0	33	122.0	138	87.0
1932 ..	88	428.1	119	340.4	30	117.9	201	72.6
1933 ..	78	415.4	199	201.1	77	170.8	823	92.2
1934 ..	31	482.6	49	264.4	64	172.9	521	91.6
1935 ..	24	471.3	31	308.9	49	161.3	512	97.3
1936 ..	28	513.3	39	362.3	74	223.2	403	111.6
1937 ..	27	406.8	48	296.9	19	202.7	146	114.1
1938 ..	51	305.3	53	288.9	31	124.3	109	80.6
1939 ..	23	376.7	35	301.6	29	151.7	112	92.1
1940 ..	27	529.1	37	384.5	37	150.1	151	89.8
1941 ..	32	436.9	20	316.7	29	195.58	138	92.5
1942 ..	26	482.0	34	363.6	58	125.0	267	91.9
1943 ..	18	595.9	33	480.0	23	176.5	69	138.1
1944 ..	40	577.5	46	433.0	72	166.0	269	101.5
1945 ..	37	576.0	25	331.8	80	213.0	208	125.6
1946 ..	57	516.8	50	513.0	60	205.5	47	110.5
1947 ..	45	441.8	31	339.0	23	158.0	40	113.0
1948 ..	51	457.5	56	338.4	45	165.5	72	115.0
1949 ..	34	519.9	29	241.8	34	152.29	88	100.5
1950 ..	38	319.78	31	147.8	15	128.13	86	90.87
1951 ..	36	462.25	26	447.8	29	157.5	103	102.5
1952 ..	39	688.5	15	478.1	19	131.31	110	97.5
1953 ..	20	327.9	26	387.2	27	147.2	123	104.6

LAW, ORDER AND JUSTICE.

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Statements of disposal year to year from 1920 to 1944.

Year.	Uncontested.	Contested.	Uncontested.	Contested.
<i>Munsif's Court, Dhanbad.</i>				
1920	359	133.0	118	73.07
1921	350	131.0	129	180.0
1922	228	137.0	82	191.0
1923	283	147.0	183	226.0
1924	255	139.0	143	210.0
1925	205	129.0	163	215.0
1926	334	127.0	147	222.0
1927	267	156.0	120	312.0
1928	391	168.0	173	270.0
1929	373	148.8	117	300.8
1930	362	175.0	218	364.7
1931	406	189.4	215	369.3
1932	362	240.5	169	407.8
1933	139	107.3	79	344.9
1934	202	194.1	126	334.6
1935	294	162.1	123	333.2
1936	190	168.6	82	264.8
1937	383	198.8	48	386.8
1938	245	219.7	40	384.1
1939	254	243.0	101	350.49
1940	211	26.49	123	386.88
1941	303	229.0	148	390.0
1942	332	263.21	123	473.66
1943	291	251.97	105	504.79
1944	276	288.91	104	535.06
1945	368	307.55	91	555.84

Year.			Uncontested.		Contested.		Uncontested.		Contested.	
1946	..	..	664	321.96	106	541.81	282	122.25	60	211.75
1947	..	..	150	326.67	47	596.72	220	147.62	46	223.43
1948	..	..	218	302.8	101	606.4	230	124.5	55	194.2
1949	..	..	241	261.6	97	456.38	250	110.8	95	171.8
1950	..	..	328	253.6	91	526.08	328	120.4	85	172.2
1951	..	..	320	309.07	74	565.87	264	159.8	58	163.1
1952	..	..	470	370.90	133	707.06	322	142.03	70	182.07
1953	..	..	461	285.28	73	605.60	270	125.46	36	174.86
1954	..	..	432	261.52	80	485.42	300	135.15	86	173.12

Munsif's Court, Dhanbad.

Year.			Title.	Money.	Total.	Value (in rupees).
1920	..	..	200	469	660	1,27,823
1921	..	..	267	257	524	1,50,022
1922	..	..	241	459	700	1,91,768
1923	..	..	126	271	397	97,170
1924	..	..	239	488	727	1,49,669
1925	..	..	205	791	1,086	1,78,560
1926	..	..	282	419	701	1,43,502
1927	..	..	349	1,393	1,742	3,79,493
1928	..	..	329	1,499	1,828	3,79,493
1929	..	..	402	1,606	2,019	3,56,857
1930	..	..	493	1,523	2,016	3,86,491
1931	..	..	513	1,696	2,209	3,95,172
1932	..	..	212	1,378	1,590	2,89,990

Year.				Title.	Money.	Total.	Value (in rupees).
1933	..	..	..	130	699	829	1,55,209
1934	..	..	..	190	791	981	1,92,262
1935	..	..	..	227	826	1,053	1,63,571
1936	..	..	..	188	712	900	1,46,029
1937	..	..	..	496	1,212	1,708	2,67,950
1938	..	..	..	152	1,247	1,399	2,41,342
1939	—	..	..	240	1,181	1,421	25,09,041
1940	..	..	..	310	1,164	1,474	2,26,768
1941	..	..	..	242	1,140	1,382	2,33,634
1942	..	..	..	284	626	910	1,64,313
1943	..	..	—	239	815	1,054	2,27,422
1944	..	..	..	233	680	913	1,65,931
1945	..	..	..	265	445	710	1,67,264
1946	..	..	..	235	428	661	1,76,383
1947	..	..	..	260	403	663	2,03,614
1948	..	..	..	200	490	780	2,53,013
1949	..	..	..	334	665	1,019	4,02,897
1950	..	..	..	453	593	1,046	4,44,241
1951	..	..	..	422	640	1,062	5,03,088
1952	..	..	..	331	718	1,049	6,08,650
1953	..	..	..	397	761	1,158	6,07,827
1954	..	..	..	419	692	1,111	5,86,158

Statistics of the Civil

Courts.	Nature of cases.	1944.		
		Instituted.	Received by transfer, etc.	Disposed of.
1	2	3	4	5
	<i>Suits.</i>			
District Judge, Man- bhum-Singhbhum.	O. P. ..	22	1	4
	Regular Appeals ..	288	5	39
	Miscellaneous Appeals ..	60	..	50
	Miscellaneous cases ..	144	..	115
	Ex. cases ..	5	..	1
	<i>Suits.</i>			
Sub-Judge, Dhanbad	O. P. ..	85	4	86
	S. C. C. ..	370	77	341
	Regular Appeals ..	..	21	30
	Miscellaneous Appeals ..	..	..	..
	Miscellaneous cases ..	183	9	204
	Ex. cases ..	547	..	465
	<i>Suits.</i>			
Additional Sub-Judge, Dhanbad.	O. P. ..	..	..	..
	Regular Appeals ..	..	..	..
	Miscellaneous Appeals ..	..	..	..
	Miscellaneous cases ..	..	..	..
	Ex. cases ..	..	..	..
	<i>Suits.</i>			
Munsif, Dhanbad	O. P. ..	371	5	380
	S. C. C. ..	542	..	519
	Miscellaneous cases ..	208	1	219
	Ex. cases ..	533	3	652
	<i>Suits.</i>			
Additional Munsif, Dhanbad.	O. P.
	Miscellaneous cases
	Ex. cases

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Statistics of the Civil

Courts.	Nature of cases.	1948.		
		Instituted.	Received by transfer, etc.	Disposed of.
1	2	3	4	5
<i>Suits.</i>				
District Judge, Manbhum-Singhbhum.	O. P.	11	..	2
	Regular Appeals	497	101	161
	Miscellaneous Appeals	40	9	41
	Miscellaneous cases	115	12	116
	Ex. cases .. ..	..	..	..
<i>Suits.</i>				
Additional District Judge, Manbhum-Singhbhum.	Regular Appeals .. ..	..	..	..
	Miscellaneous Appeals .. ..	..	..	..
	Miscellaneous cases .. ..	..	..	..
<i>Suits.</i>				
Sub-Judge, Dhanbad ..	O. P.	117	4	107
	S. C. C.	106	1	117
	Regular appeals .. ..	..	27	41
	Miscellaneous appeals .. ..	..	..	..
	Miscellaneous cases	107	4	115
	Ex. cases	134	..	190
<i>Suits.</i>				
Additional Sub-Judge, Dhanbad.	O. P. .. ..	..	..	..
	Regular appeals .. ..	..	..	..
	Miscellaneous appeals .. ..	..	..	..
	Miscellaneous cases .. ..	..	..	..
	Ex. cases .. ..	..	..	..
<i>Suits.</i>				
Munsif, Dhanbad ..	O. P.	451	28	319
	S. C. C.	329	3	285
	Miscellaneous cases	116	2	137
	Ex. cases	369	..	430
<i>Suits.</i>				
Additional Munsif, Dhanbad.	O. P.	307	263
	S. C. C.
	Miscellaneous cases
	Ex. cases	1

LAW, ORDER AND JUSTICE.

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Justice from 1946 to 1951.

1949.			1950.			1951.		
Instituted.	Received by trans- fer, etc.	Disposed of.	Instituted.	Received by trans- fer, etc.	Disposed of.	Instituted.	Received by trans- fer, etc.	Disposed.
6	7	8	9	10	11	12	13	14
15	..	4	11	..	9	12	..	9
497	4	62	271	24	38	286	10	28
50	..	46	56	3	29	66	..	27
104	..	94	167	4	107	174	11	135
2	..	1	1	..	1	..	..	1
..	97	99	..	62	53	..	48	7
..	12	12	..	16	16	..	9	2
3	18	10	..	1	13	..	26	2
87	15	63	88	5	59	47	1	62
112	1	122	103	1	101	124	2	131
..	27	41	..	40	42	..	22	35
..	1	..	..	0	7	..	5	4
99	1	110	90	1	67	103	1	121
124	..	160	124	..	116	136	1	128
..	45	35	..	..	..	..	89	55
..	..	..	..	..	..	..	31	31
..	3	2	..	..	..	..	1	1
..	..	..	..	..	..	3	..	2
..	..	..	..	..	..	5	..	..
571	85	338	678	118	419	716	4	394
448	1	345	369	1	413	348	1	323
138	1	134	167	5	135	164	1	189
379	11	419	524	..	454	457	1	421
..	148	173	..	145	79	..	..	..
..	59	58	..	21	20	..	..	..
18	..	16	8	3	9	..	..	..
5	..	53	31	..	27	..	..	..

Suite.

Sub-Judge, Dhanbad	O. P.	..	53	18	54	78	5	55	80	..	52
	S. C. C.	..	149	4	129	167	..	150	165	..	172
	Regular appeals	..	..	112	58	119	83	152	89	3	80
	Miscellaneous appeals	..	..	11	11	37	15	26	35	..	47
	Miscellaneous cases	..	105	..	91	101	75	159	90	..	84
	Ex. cases	..	120	..	106	94	..	104	118	..	77

Suite.

Additional Sub-Judge, Dhanbad.	O. P.	..	..	18	35	..	..	..	..	..	..
	Regular appeals	..	..	20	11	..	..	..	..	..	..
	Miscellaneous appeals	..	..	1	1	..	..	..	..	..	..
	Miscellaneous cases	..	1	..	2	..	..	..	..	..	..
	Ex. cases	..	12	..	5	..	..	..	..	..	..

Suite.

Munsif, Dhanbad	O. P.	..	662	35	603	767	33	534	731	149	512
	S. C. C.	..	387	7	392	391	10	306	381	6	388
	Miscellaneous cases	..	201	1	182	182	1	197	188	8	204
	Ex. cases	..	402	..	392	531	1	560	602	..	574

Suite.

Additional Munsif, Dhanbad.	O. P.	..	..	304	222	..	364	450	..	215	141
	S. C. C.	..	..	..	..	..	104	87	..	2	15
	Miscellaneous cases	..	15	..	13	51	..	48	16	..	14
	Ex. cases	..	41	..	12	109	..	21	49	..	31

Statistics of the Civil Justice from 1955 to September, 1956.

Courts.	Nature of cases.	1955.			From January to September, 1956.			Remarks.		
		Institu- ted.	Received by trans- fer, etc.	Disposed of.	Institu- ted.	Received by trans- fer, etc.	Disposed of.			
1	2	3	4	5	6	7	8	9		
<i>Suits.</i>										
District Judge, Man- bhumi-Singhbhum.	O. P. ..	..	18	..	5	16	3	4	
	Regular appeals ..	..	168	5	15	131	2	14	
	Miscellaneous appeals	..	29	..	9	31	..	2		
	Miscellaneous cases	..	248	..	198	197	6	137		
	Ex. cases ..	..	..	..	1	..	..	..
<i>Suits.</i>										
Additional District Jud- ge, Manbhumi-Singh- bhumi.	Regular appeals	147	99	..	113	105		
	Miscellaneous appeals	7	8	..	7	6		
	Miscellaneous cases	110	84	..	106	76		

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Suits.

Sub-Judge, Dhanbad	O. P. ..	96	24	51	69	7	45
	S. C. C.	190	..	132	192	..	149
	Regular appeals	159	18	67	115	2	69
	Miscellaneous appeals	20	1	21	33	1	17
	Miscellaneous cases	114	3	110	103	1	96
	Ex. cases	99	2	89	109	..	98

Suits.

Additional Sub-Judge, Dhanbad.	O. P. ..	..	59	39	..	..	..
	Regular appeals	..	105	89	..	..	..
	Miscellaneous appeals	..	9	8	..	..	..
	Miscellaneous cases	..	1	..	..	..	..
	Ex. cases	..	1	..	..	..	..

Suits.

Munsif, Dhanbad	O. P. ..	707	41	542	599	118	463
	S. C. C.	394	3	363	359	3	320
	Miscellaneous cases	195	..	180	163	16	169
	Ex. cases	476	3	498	470	62	444

Suits.

Additional Munsif, Dhanbad.	O. P.	494	407	..	5	217
	S. C. C.
	Miscellaneous cases	23	24	..	14
	Ex. cases	20	58	..	25

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Suits.

Subordinate 1st Court, Dhanbad.	Judge, Dhanbad.	O. P.	16	1	9	63	5	40
S. C. C.	33	1	47	161	12	132
Regular appeals	10	..	14	..	7	54
Miscellaneous appeals	6	..	3	..	1	15
Miscellaneous cases	23	..	30	57	..	48
Ex. cases	29	..	23	114	..	48

Suits.

Subordinate 2nd Court, Dhanbad.	Judge, Dhanbad.	O. P.	2	63	5	25	1	25
S. C. C.	22	6	1
Regular appeals	75	8	..	29	43
Miscellaneous appeals	6	3	..	5	3
Miscellaneous cases	2	..	2	15	13	8
Ex. cases	2	..	1	7	7	11

Suits.

Munsif, 1st Court, Dhanbad.	O. P.	178	4	68	644	12	371
S. C. C.	53	..	82	296	1	140
Miscellaneous cases	28	1	21	96	1	110
Ex. cases	72	..	84	444	..	305

Suits.

Munsif, 2nd Dhanbad.	Court, Dhanbad.	O. P. ..	..	8	106	34	112	93	186
S. C. C.	2	..	..	8	41	67	16
Miscellaneous cases	4	1	1	57	10	29	7
Ex. cases	5	14	2	88	106	7	7

Statistics of the Civil cases from 1958 to 1959.

1959.

1958.

Nature of cases.

Courts.

Instituted. Received by trans-
fer, etc.

Disposed of.

Instituted. Received by trans-
fer, etc.

Disposed of.

1 2 3 4 5 6 7 8

DHANBAD.

Suits.

1. District Judge, Dhanbad	(1) O. P. (Ordinary procedure)	..	19	..	8	17	..	11
	(2) Regular appeals	..	104	1	11	138	1	7
	(3) Miscellaneous cases	..	107	..	68	107	..	100
	(4) Miscellaneous appeals	..	41	..	9	81	..	8
	(5) Execution cases	..	4	..	2	2	..	2
2. Additional District Judge	(1) Regular appeals	..	..	8	1	..	41	16
	(2) Miscellaneous appeals	..	..	1	2	..	..	9
	(3) Miscellaneous cases	..	..	..	3	..	..	9
	(4) Execution cases	..	..	..	..	..	..	..

Suite.

3. Subordinate Court.	Judge	1st	(1) O. P. (Ordinary procedure)	..	52	4	66	43	3	35
..	(2) Small Cause Court Suit	..	110	1	194	123	3	120
..	(3) Regular appeals	..	..	65	39	..	38	57
..	(4) Miscellaneous appeals	..	..	..	14	..	..	14
..	(5) Miscellaneous cases	..	95	1	87	50	3	52
..	(6) Execution cases	..	109	..	170	116	..	116

Suite.

4. Subordinate Court.	Judge	2nd	(1) O. P. (Ordinary procedure)	..	32	4	37	40	3	34
..	(2) Small Cause Court Suit	..	44	1	55	56	2	53
..	(3) Regular appeals	..	..	44	52	..	70	78
..	(4) Miscellaneous appeals	..	..	..	10	..	..	14
..	(5) Miscellaneous cases	..	44	..	54	76	..	85
..	(6) Execution cases	..	124	..	19	57	..	29

Suite.

5. Munsif, 1st Court	..	..	(1) O. P. (Ordinary procedure)	..	497	17	476	510	18	491
..	..	..	(2) Small Cause Court Suits	..	234	6	390	224	3	222
..	..	..	(3) Miscellaneous cases	..	149	3	149	126	..	188
..	..	..	(4) Execution cases	..	346	..	394	353	1	328

Suite.

6. Munsif, 2nd Court	..	..	(1) O. P. (Ordinary procedure)	..	273	31	246	277	34	247
..	..	..	(2) Small Cause Court Suits	..	234	6	390	57	1	54
..	..	..	(3) Miscellaneous cases	..	66	..	79	68	2	77
..	..	..	(4) Execution cases	..	138	..	193	147	..	115

Suita.

3. Subordinate Judge, Court.	1st	(1) O. P. (Ordinary procedure)	..	52	23	51	51	10	67
		(2) Small Cause Court Suits	..	104	..	92	167	7	134
		(3) Regular appeals ..	..	Nil	26	27	Nil	78	52
		(4) Miscellaneous appeals ..	..	Nil	..	14	Nil	7	3
		(5) Miscellaneous cases ..	..	64	2	76	55	23	54
		(6) Execution cases ..	..	102	1	156	117	..	95

Suita.

4. Subordinate Judge, Court.	2nd	(1) O. P. (Ordinary procedure)	..	41	19	61	50	7	27
		(2) Small Cause Court Suits	..	41	Nil	49	54	5	36
		(3) Regular appeals ..	..	Nil	25	42	..	71	47
		(4) Miscellaneous appeals ..	..	Nil	2	2	..	7	2
		(5) Miscellaneous cases ..	..	81	Nil	80	88	5	77
		(6) Execution cases ..	..	77	..	75	49	..	52

Suita.

5. Munaf, 1st Court	..	(1) O. P. (Ordinary procedure)	..	540	23	391	625	42	421
		(2) Small Cause Court Suits	..	147	5	187	154	21	151
		(3) Miscellaneous cases ..	..	172	1	145	141	3	152
		(4) Execution cases ..	..	293	..	376	427	..	486

Suita.

6. Munsif, 2nd Court	..	(1) O. P. (Ordinary procedure)	..	271	15	268	349	63	300
		(2) Small Cause Court Suits	..	63	Nil	84	86	6	63
		(3) Miscellaneous cases ..	..	85	Nil	80	78	30	82
		(4) Execution cases ..	..	160	..	163	151	..	172

CHAPTER XI.

LOCAL SELF-GOVERNMENT.

HISTORY OF LOCAL SELF-GOVERNMENT.

The administrative history of Dhanbad district may be briefly reiterated as an introduction to this text. The bulk of the present Dhanbad district was at first known as the Govindpur subdivision with headquarters at Bagsooma village which was later transferred to Govindpur and then to Dhanbad spelt Dhanbaid till about 1917. This subdivision was a part of Manbhum district and continued as such till the status was raised to that of sub-district in 1921. In 1956, it became a full-fledged district. Chas and Chandankeary thanas of Manbhum district were added to Dhanbad while most of the other area of the Manbhum district went over to the State of West Bengal.*

Till Dhanbad was separated and raised to the status of district, the local affairs were looked after by the Dhanbad Local Board under the control of Dhanbad District Board. The District Board of Dhanbad was constituted on the 26th October 1956 under Government notification no. 10179-L.S.-G., dated the 26th October 1956. The Dhanbad Local Board was constituted in 1902 and continued till 1956. It had jurisdiction over the sub-district of Dhanbad barring the areas covered by the municipality and notified areas.

The last *District Gazetteer of Manbhum* (1911) mentions that the Local Board consisted of 14 Government nominated members only**. The membership was raised to 21 in 1939 out of which 16 were elected and five were nominated by the District Board. The Chairman of the Local Board was elected. The chief functions of the Local Board were the maintenance of the village roads, control of pounds, wells and looking after rural sanitation and education. The Local Board used to get funds from the District Board by instalments.

The following are the receipts and expenditures of Dhanbad Local Board from 1945-46 to 1955-56†:—

Year.	Receipt.	Expenditure.		
		On medical.	On educa- tion.	On com- munication.
	Rs.	Rs.	Rs.	Rs.
1945-46	3,20,000	44,852	91,413	94,575
1946-47	3,40,000	43,624	92,478	93,706

*A small portion had gone to Singhbhum district of Bihar.

** The District Gazetteer of Manbhum by H. Coupland, 1911, pp. 255-56.

† The figures are collected from the District Board office.

Year.	Receipt.	Expenditure.		
		On medical.	On educa- tion.	On com- munication.
	Rs.	Rs.	Rs.	Rs.
1947-48	5,75,000	55,025	1,84,804	1,40,089
1948-49	6,00,000	60,816	2,10,785	1,59,584
1949-50	7,00,000	64,277	2,63,938	1,09,994
1950-51	5,30,944	68,400	2,85,485	2,21,228
1951-52	7,50,000	65,897	3,54,738	2,06,272
1952-53	8,50,000	67,106	3,52,154	2,43,057
1953-54	4,80,000	60,294	2,34,459	1,84,672
1954-55	9,50,000	83,007	1,55,538	3,80,494
1955-56	3,50,000	78,015	1,42,612	3,63,089

The local Board also maintained 83 miles tarred roads, 35 miles unmetalled roads, 100 miles of gravelled roads and 153 miles of village roads.

Another institution of Local Self-Government was the Jharia Mines Board of Health, established in 1913 under Bengal Mining Settlement Act, 1912 to look after the sanitation of collieries and for the supervision of medical relief arrangements. In 1915, Chas Union Committee was established to look after the sanitation work. The third institution of Local Self-Government was the Dhanbad Municipality, established in 1919. This municipality looked after the local affairs of Dhanbad town which has rapidly become an industrial city and is still on a rapid expansion. The most significant and rather revolutionary step was taken to foster the spirit of Local Self-Government in 1947, when the Bihar Panchayat Raj Act was passed. It was implemented in the Manbhum district in 1948 when Dhanbad was a sub-district and since then up to 1961, altogether 203 *Gram Panchayats* have been established.

DHANBAD MUNICIPALITY.

Before the establishment of the municipality in the district of Dhanbad there was a Union Committee. In 1919 the Union Committee was succeeded by the Dhanbad Municipality. The municipality had 20 members in 1923 out of whom 16 were elected and four were nominated. In 1957, the municipality consisted of 27 Commissioners out of whom 22 were elected and five were nominated by the Government. At present (1962), there are 34 Commissioners

out of whom 28 are elected and six are nominated by the Government. The Chairman and the Vice-Chairman of the municipality are elected. The area of the municipality is eight square miles and it is divided into 28 wards. The number of rate-payers in 1961 was 5,700. Jharia, Bhaga, Sindri which have come to be a part and parcel of Dhanbad are outside the municipal limits of Dhanbad Municipality. Sindri has a Notified Area Committee while Jharia and Bhaga are looked after by Jharia Mines Board of Health. The jurisdiction of the municipality extends from Dhanbad town to Voltar village, to the north (three miles), to the south from Dhanbad town to Matkuriya (three miles), to the east from Dhanbad town to Saraidhela village (3 miles) and to the west Bishanpur village (four miles).

Sanitation.

There are four Sanitary Inspectors and 15 Jamadars in the municipality. There are 332 sweepers out of 187 are males and 145 are females for conservancy work. There are three trucks and one tractor for the collection of refuse and garbage. The night-soil is collected from the latrines by the sweepresses in buckets and is taken to the night-soil depot. The method of disposal of night-soil is very primitive and anti-social. The night-soil trailers are taken to the trenching grounds by the help of bullock carts. There are six night-soil carts and two trenching grounds. There are four midwives and four *dais* to attend the delivery cases. The municipality has constructed only one public latrine of 12 seats at Domepara in Dhanbad town. In absence of public latrines and urinals at convenient places the local residents commit nuisance in the open and even by roadside. There are 4,199 private lavatories in the town. This number is inadequate.

At the time of epidemics mass inoculation, vaccination and disinfection of houses and wells are carried out. The statement given below will show the occurrence of epidemics, deaths and attacks and the preventive measures taken by the municipality in the recent years:—

Year.	Small-pox,		Cholera,		Vaccination.		No. of wells disinfected.
	Attack.	Death.	Attack.	Death.	Primary.	Revaccination.	
1958-59	Nil	Nil	4	2	496	14,284	9,697
1959-60	Nil	Nil	3	1	451	12,841	945
1960-61	Nil	Nil	Nil	Nil	566	16,088	472
1961-62	1	1	Nil	Nil	573	17,929	281

Education.

The municipality maintains 13 lower primary, 13 upper primary and three middle schools. Out of three middle schools, one school is for girls. There is co-education in upper and lower primary schools.

The statement given below shows the number of teachers employed and number of students attending the municipal schools during 1961-62:—

	No. of schools.	No. of students.	No. of teachers.
Lower Primary ..	13	1,805	39
Upper Primary ..	13	540	14
Middle ..	3*	209	12
Total ..	29	2,554	65

Out of 39 teachers employed in lower primary schools there are five mistresses, three mistresses in the girls' middle school and two mistresses in upper primary schools.

The municipality also exercises control over 15 lower and upper primary schools which are running under the Expansion and Improvement of Primary Education Scheme. There is a physical training school under the municipality which is looked after by a physical instructor. The municipality spends a total sum of Rs. 398 every year.

Water-Supply.

The supply of piped water for the municipal area of Dhanbad town has been in existence since 1960. There are two water towers which have been constructed in 1960. Their capacity is one lakh gallon of water. Prior to this arrangement, water-supply was done through wells. The scheme for the installation of piped water was taken over by the Public Health Engineering Department in the year 1958-59 at the estimated cost of Rs. 28,00,000 on the basis of 50 per cent loan and 50 per cent grant from the Government of Bihar. At present (1962), there are 154 stand-posts in the town, which are not sufficient for the town. The municipality purchases water from the Jharia Water Board at the rate of 83 nP. per thousand gallon. There are also 32 municipal wells and 566 private wells in the town for the benefit of the town people.

Roads and Drains.

In 1962, the total road mileage within the limits of the municipality is 17 miles out of which 14 miles are metalled, one mile gravelled and two miles are *katcha* roads. The condition of the roads is good.

The total drain mileage within the limits of the municipality is 17 miles. There is no underground drainage system in the town. Accumulation of water at places becomes a breeding ground for the mosquitoes. Without a proper sewerage system the sanitation of the place cannot be improved.

Slaughter-house.

There is a slaughter-house at Hirapur *hat* of the municipality. This slaughter-house is only for goats and sheep. Besides there are also five slaughter-houses for goats and sheep in the town. There is no doubt that goats are slaughtered privately also and the meat is sold.

Burning Ghats.

There are two burning *ghats*, one at Matkuria and another at Hirapur under the municipal area. Fuel is always available at the burning *ghat*. There is a burial ground for the Christians near the Dhanbad Railway Station. There is also burial ground for Moham-madans which is near the Dhanbad Railway Station.

Municipal Market.

There is a municipal market at Hirapur. Fish, vegetables and other food-stuff are sold in the market. The municipality realises tax from stalls. There is hardly any check on control on the stuff sold.

Street lighting.

There is lighting arrangement on the municipal roads. There are 610 bulbs which are lighted on 15 dark nights in the month (1962). A sum of about Rs. 9,000 is spent yearly over it.

Recreation Grounds.

The municipality has one children park near town hall but it is not in a good condition.

Sources of income.

The main sources of income are from latrine tax, holding tax, registration and license fees, rent from market and slaughter-house, stalls, and Government grants.

The statement given below shows the annual rate of registration fees and the number of vehicles registered in 1961-62:—

Type of vehicles	Registration fee.	Total number of vehicles registered.
Cycle	Rs. 4	2,983
Cycle Rickshaw	Rs. 10.12	396
Cart	Rs. 8	768

The Statement given below shows the receipt and expenditure of the municipality from 1956-57 to 1961-62.

Receipt.

Serial no.	Head of accounts.	1956-57.	1957-58.	1958-59.	1959-60.	1960-61.	1961-62.
1	2	3	4	5	6	7	8
		Rs. a. p.	Rs.	Rs.	Rs.	Rs.	Rs.
1	Municipal Taxes ..	1,69,176 6 7	1,86,438.31	2,19,843.32	3,79,994.59	2,16,465.55	3,36,665.11
2	Municipal Registration fees.	6,987 0 3	6,170.85	6,878.94	6,049.10	5,951.95	16,831.31
3	Registration under Special Acta.	Nil	Nil	Nil	Nil	Nil	330.00
4	Revenue derived from municipality.	17,050 3 6	9,776.86	33,012.73	28,832.59	36,678.62	21,772.27
5	Government grant contribution.	1,51,574 14 0	72,215.28	1,70,909.19	13,90,256.94	2,17,494.74	5,79,025.80
6	Miscellaneous ..	7,816 7 9	8,256.58	1,706.35	8,241.89	66,021.63	2,07,194.15
7	Extraordinary debts	53,827 15 7	6,571.59	70,034.25	25,984.69	6,12,864.95	2,05,866.75
	Total ..	4,06,432 15 8	3,29,419.49	5,02,294.68	18,39,903.80	11,55,497.44	13,87,705.39

Expenditure.

Serial no.	Head of accounts.	1956-57.	1957-58.	1958-59.	1959-60.	1960-61.	1961-62.
1	2	3	4	5	6	7	8
		Rs. a. p.	Rs.	Rs.	Rs.	Rs.	Rs.
1	General Administration collection charges.	22,182 11 0	25,461.34	35,634.71	34,249.17	45,629.43	51,966.01
2	Public safety	22,263 5 0	1.75	2,859.47	19,136.23	26,566.01	18,905.28
3	Public Health	1,57,570 3 3	1,77,470.78	1,80,663.63	16,61,960.90	8,73,928.34	5,59,281.61
4	Medical	3,529 11 6	3,231.65	3,429.52	4,927.51	3,478.44	4,007.97
5	Public	1,05,374 11 6	36,735.08	39,301.51	54,625.75	30,600.96	23,284.97
6	Public instructions and education.	50,319 10 0	59,286.30	78,551.93	76,216.89	90,146.33	98,022.67
7	Miscellaneous	10,976 13 6	9,168.72	18,567.67	40,643.37	25,126.80	54,626.65
8	Extraordinary debt	18,959 14 3	29,875.60	39,412.23	8,244.82	49,569.13	2,23,513.90
	TOTAL	3,89,177 0 0	3,41,231.22	3,98,421.07	18,78,005.23	11,44,147.44	10,33,611.06

From the statements of receipt and expenditure it appears that there was an increase in receipt in 1959-60 because the municipality had taken loan from Government for water-supply and the expenditure was also high in the same year due to the heavy expenditure on public health and extraordinary debts. The receipt during 1961-62 was Rs. 13,87,705 as against Rs. 21,529 of 1919-20. This increase of about rupees 12 lakhs was due to the industrialisation of the town. There was also an increase in expenditure during 1961-62 as compared with the year 1919-20.

DISTRICT BOARD.

After promulgation of the Bihar L. S.-G. and Cess (Amendment) Ordinance, 1956 (Bihar Ordinance no. V of 1956), the Dhanbad Local Board (under the former Manbhum District Board) having jurisdiction over the entire Dhanbad subdivision of the old Manbhum district was abolished. A District Board was established for the new district of Dhanbad, comprising the entire Dhanbad subdivision and the areas of Chas and Chandankary police-stations of the old Manbhum district. The District Board was constituted under the Government notification no. 10179-L. S.-G., dated the 26th October 1956 under sub-section (i) of section 6 of the Bihar and Orissa L. S.-G. Act, 1885. All powers and duties conferred and imposed on the District Board by the Bihar and Orissa L. S.-G. Act, 1885, and a committee consisting of 19 members with the Deputy Commissioner, Dhanbad, as its Chairman was formed under the notification no. 10182-L. S.-G., dated the 26th October 1956. The Dhanbad District Board Committee consisting of 19 members began to function with effect from the 27th October, 1956. A special meeting on 12th November 1956 elected a non-official Vice-Chairman.

In 1961 (March), the committee of the 19 members was dissolved and all the members of the committee including the Chairman and Vice-Chairman vacated their offices with effect from the 29th March 1961. This was done according to Government notification no. 2831-L. S.-G., dated the 29th March 1961, issued under sub-section (i) of section 2 of the Bihar District Boards and Local Boards (Control and Management) Act, 1958 (Bihar Act XX of 1958). When the committee dissolved, the Additional Deputy Commissioner, Dhanbad, was appointed to exercise and perform the powers, functions and duties conferred or imposed by or under the Bihar and Orissa L. S.-G. Act of 1885 (Bengal Act III of 1885) or any other Act or the rules framed thereunder on the District Board of Dhanbad or on the Chairman of the Dhanbad District Board Committee, under Government notification no. 2832-L. S.-G., dated the 29th March 1961. The Additional Deputy Commissioner remained in charge of the District Board from the 29th March 1961 to June, 1961. After that the Government appointed a Special Officer who remained as such till the 15th April 1962. From the 16th April 1962 he was designated as Administrator by the Government notification no. 2909-L. S.-G., dated the 16th April 1962.

The reasons given by the State Government for taking the District Boards and Local Boards by Government mentioned in the Bihar District Boards and Local Boards (Control and Management) Bill, 1958, which was enforced in Dhanbad in 1961, are as follows:—

"The District Boards and Local Boards constituted under the provisions of the Bihar and Orissa Local Self-Government Act, 1885, have outlived their utility under the complete changed circumstances. On attainment of independence, there have been developments on a very large scale in the various fields of activities, viz., Agriculture, Industry, Co-operation, Gram Panchayats, etc. The developments call for a complete reorientation in the conception and constitution of District Boards and Local Boards so that these bodies could fulfil their role effectively in the changed circumstances. This is not possible unless the existing law is carefully examined in the light of these developments and is amended suitably to meet the present needs of the society.

"The Balwantrai Mehta Committee on the Community Development and National Extension Service have made a number of recommendations specially with regard to the future set up of District Boards. The recommendations require detailed examinations and careful consideration before the State Government could come to a definite decision in the matter, which will obviously take some considerable time. Besides, some of the sister States in India are considering legislation regarding the constitution and powers of these local bodies and it is necessary to examine the provisions of these laws and their actual working before we embark on a comprehensive amendment of the Bihar and Orissa Local Self-Government Act.

"It is, therefore, clear that the new set up of District Boards undoubtedly requires comprehensive amendment of the Bihar and Orissa Local Self-Government Act.

"It is, therefore, clear that the new set up of District Boards undoubtedly requires comprehensive amendment of the Bihar and Orissa Local Self-Government Act of 1885. It was accordingly decided by the State Government to take over temporarily for three years the control and management of District Boards and Local Boards pending consideration of their future set up. The District Boards and Local Boards (Control and Management) Ordinance, 1958, has been promulgated to give effect to this decision. The Bill seeks to convert an ordinance into an Act of the State Legislature as the ordinance will cease to have effect after six weeks from the commencement of the present session of the State Legislature."

In this way the control and management of Dhanbad District Board was taken over by the State Government on the 29th March 1961. There is a gazetted government servant known as the Administrative Officer who is now in charge of the District Board under the general control of the Deputy Commissioner.

Functions.

Public Health.—The Public Health Reorganisation Scheme as formulated by the Government is functioning in this district with the following staff:—

- (1) District Medical Officer—1.
- (2) Health Inspectors—2.
- (3) Sanitary Inspector—1.
- (4) Vaccinators—65.
- (5) Disinfectors—5.

The usual epidemics of this district are cholera and small-pox. In the year 1959 small-pox was prevalent under the jurisdiction of District Board, 27 persons were attacked by the small-pox out of whom three died. In 1961, there was no attack of cholera and small-pox.

The main function of the Public Health staff of the District Board is to prevent and combat epidemics. During 1961, 40,831 persons were inoculated and 1,770 and 26,016 persons were given primary and re-vaccinations respectively, 16,696 wells were also disinfected.

The construction of bore hole latrines is also taken up in the rural areas. Extensive public health propaganda is done by the public health staff by means of distributing leaflets, delivering lectures and celebrating World Health Day throughout the district.

Medical relief.—For the medical relief in the rural areas the Board maintains eight Allopathic dispensaries located at Rajganj, Salukchapra, Chirkunda, Garh-Raghunathpur, Nagarkhari, Chuliara, Gomoh and Tupra. There are five Homoeopathic dispensaries located at Lawadih, Ghaghra, Brahmandiha, Phularitand and Khamarbandi and there are six *Ayurvedic* dispensaries situated at Jharia, Barnaghur, Maniadih, Silfora, Dhokra and Mirda and there is one Unani dispensary at Nawadih. Besides, there are five Homoeopathic and three *Ayurvedic* subsidised dispensaries under the Board. There are four Maternity and Child Welfare Centres at Chas, Chandankiari, Rajganj and Gomoh and the Family Planning Centres are also attached to these centres. The District Board's dispensaries have no indoor beds and surgical operations are not performed except in the Maternity and Child Welfare Centres. The expenditure over medical relief in 1960-61 was Rs. 1,19,816.

Education.—In 1960-61, the total number of schools under Board's management was 97 out of which 36 were middle schools, 31 upper primary and 20 lower primary schools. The number of Government-aided schools was 340 out of which 27 were middle schools, 108 upper primary and 205 were lower primary schools. The total expenditure on education in 1960-61 was Rs. 19,393. The

District Superintendent of Education is the authority of the District Education Fund. But the budget of the Education Fund is sanctioned by the District Board and the appointment and transfer of teachers in respect of Board-managed schools are also made by the Administrator, District Board, Dhanbad. Thus it appears that despite a separate Education Fund operating under the District Superintendent of Education, the District Board has still some control over education. Regarding stipendiary and aided schools the power of the District Board has been reduced, nevertheless, the consent of the Administrator of the District Board is sought while making appointment of teachers in such schools. In case the Administrator differs with the District Superintendent of Education the matter is referred to the Deputy Commissioner whose decision is final. The details may be found in the Chapter 'Education and Culture'.

Road.—The area of the District Board is 1,108.78 square miles and it maintains 87 miles 108 yards of metalled roads, 123 miles 4 furlongs, 75 yards of unmetalled roads and 144 miles 3 furlongs village roads. The main roads of the district are maintained by the Public Works Department. The statement given below shows the expenditure over roads for the year 1960-61:—

Year.	Total length in			Cost of repairs in Rs.	Cost of repairs per mile in Rs.	Cost of original work in Rs.
	M.	F.	Yards.			
<i>Metalled.</i>						
1960-61 ..	87	--	108	2,50,769	2,882	85,963
<i>Unmetalled.</i>						
1960-61 ..	123	4	75	50,546	482	1,33,360
<i>Village roads.</i>						
1960-61 ..	144	3	120	68,115	472	1,66,865

Income.—The main sources of income of the District Board are Coal Cess and Road Cess, originally payable by colliery owners and landlords under the Cess Act. The coal cess is paid at the rate of 22 nP. per ton of despatch. The Road Cess was paid at the rate of 6 nP. for every rupee of the land revenue by the tenant and the equal amount by the Government. The Road Cess used to be paid along with the land revenue and then the Road Cess was transferred

to the Board's fund in the Government treasury after the deduction of the cost of realisation. After passing the Bihar Land Reforms Act, 1950, the Government took over the charge of zamindari from landlords and now it is the liability of the State Government to pay cess to the District Board. The present rate (1962) of cess is two annas for every rupee of the land revenue. During 1960-61, Rs. 38,22,381 was received by Coal and Road Cess as against Rs. 12,06,865 in 1959-60. There was an increase of about Rs. 26 lakhs during 1960-61 because the assessment of two years, i.e., 1959-60-1960-61 was done. The receipt in 1959-60 from Coal and Road Cess was the arrear dues of the previous years. The other main income is from pounds and carts. The District Board maintains 13 cattle pounds which are located at Pathardih, Jharia, Topchanchi, Katras, Baghmara, Tundi, Nirsia, Chirkunda, Rajganj, Govindpur, Chandankiari, Pindrahat and Barwa Daldab. The average annual income from the pounds is about two thousand rupees. The other source of income is from cart tax. The rate of registration of cart is as follows:—

Agricultural carts—Rs. 2.

Business carts—Rs. 4.

The income from cart tax during 1961-62 comes to Rs. 4,299.

Expenditure.—The main items of expenditure are Public Health, Civil Works, Medical, Education and General Administration.

The statement given below shows the Board's income and expenditure in rupees from 1956-57 to 1960-61.

Income.

Head of receipts.	1956-57.	1957-58.	1958-59.	1959-60.	1960-61.
Land Revenue ..	1,000	3,000	1,453	3,004	1,097
Local rates (roads and mines). ..	0,56,973	13,77,590	16,11,641	12,00,865	38,22,381
Medical ..	17,058	32,598	10,837	41,387	31,968
Scientific and other minor departments.	159	451	415	450	476
Miscellaneous ..	10,093	45,568	51,717	59,123	69,733
Civil Works ..	31,382	1,12,650	88,777	1,45,365	1,84,026
Deposits and Advances.	31,060	1,88,937	4,37,265	2,70,653	1,64,842
Law and Justice	Nil	Nil	1,005	750	2,135
Depreciation Fund	Nil	Nil	10,000	10,000	10,000
TOTAL ..	7,49,915	17,60,794	22,13,050	17,36,197	42,87,858

Expenditure.

Head of expenditure.		1956-57.	1957-58.	1958-59.	1959-60.	1960-61.
		Rs.	Rs.	Rs.	Rs.	Rs.
General Adminis- tration.		17,170	52,828	49,374	54,339	51,858
Police	..	16	48	32	48	60
Public Health	..	9,525	55,312	1,40,315	89,363	81,753
Medical	..	32,449	90,230	1,14,388	1,25,354	1,19,816
Scientific and other Minor Depart- ments.		8,391	19,328	26,030	18,786	17,064
Superannuation al- lowances, pensions, etc.		3,734	8,923	11,999	12,293	15,988
Stationery and Prin- ting.		454	1,696	41,256	20,514	13,001
Miscellaneous	..	52,807	13,130	8,687	72,394	8,737
Civil Work	..	2,10,373	9,99,120	12,05,324	8,18,510	8,32,904
Debt Deposits and Advance.		41,399	1,59,545	3,39,165	2,52,439	1,66,773
Education	..	Nil	1,78,088	1,81,094	1,81,127	1,93,931
Famine and relief..		Nil	260	880	500	80
Interest	..	Nil	180	162	73	80
Investment	..	Nil	1,00,000	Nil	..	..
Depreciation	..	Nil	..	10,000	10,000	10,000
TOTAL	..	3,76,318	16,84,668	21,88,706	16,61,790	15,11,965

JHARIA WATER BOARD.

The Jharia Water Board was established in 1914 for the purpose of construction and maintenance of waterworks and for the supply of water for domestic purposes to the Jharia Coalfields.

The Board consists of 10 members out of whom five are nominated by the Government and five are elected by mine owners and there is a Secretary who is the administrative head of the Jharia Water Board and Jharia Mines Board of Health. The Secretary is a

Government servant of a gazetted rank. The Deputy Commissioner, Dhanbad, is the Chairman of the Board.

The present water-supply area is 51.6 square miles. The Board has three units, namely, Jharia, Kusunda and Tetulmari units. There is a water reservoir at Topchanchi which was completed in 1924. The present capacity is 2.40 million gallons per day. There is also a Damodar Water-Supply Scheme reservoir at Jamadoba under the Board and the capacity of it is nine million gallons per day. The average daily supply of water from all sources is 4.50 million gallons. About 216 collieries and 115 villages with a population of 4,64,000 are served by the water-supply. The total length of service pipe line is 105 miles.

The Board has given 959 water pipe connections to the private houses for domestic supply at the rate of Re. 1 to Rs. 8 per thousand gallon and for non-domestic supply Rs. 2 to Rs. 16 per thousand gallon, 220 collieries at the rate of Re. 1 per thousand gallon. Besides, there are 28 free stand-posts in Kusunda area, 60 free stand-posts at Jharia and 23 in Katras area. There are three Inspectors, posted at Jharia, Kusunda and Katras to look after the water-supply management of these areas. Besides, there are one Executive Engineer, two Assistant Engineers, one Waterworks Superintendent for the management of water-supply.

The statement given below shows the receipt and expenditure of the Board since 1950-51 to 1961-62:—

Year.		Receipt.	Expenditure.
		Rs.	Rs.
1950-51	..	13,13,881.84	13,34,062.32
1951-52	..	11,59,773.80	11,44,625.27
1952-53	..	12,05,230.62	8,49,313.81
1953-54	..	12,53,705.69	20,77,197.80
1954-55	..	13,27,864.81	9,94,849.53
1955-56	..	9,13,830.62	17,26,924.09
1956-57	..	12,37,162.96	52,47,826.26
1957-58	..	24,65,178.12	23,03,585.56
1958-59	..	14,32,054.27	18,28,148.51
1959-60	..	40,06,804.63	34,78,468.06
1960-61	..	22,51,349.19	28,05,126.21
1961-62	..	19,83,695.67	17,27,964.79

From the statement it appears that during 1959-60 the income was Rs. 40,06,804.63 because the Board had taken money on loan from

Government. During 1956-57, the expenditure was Rs. 52,47,826.26 because Board gave money to P.H.E.D. for the installation of pipe lines to the coalfield areas.

JHARIA MINES BOARD OF HEALTH.

In the decade of 1901-10 there was a rapid influx of labour due to the development of mining industry. There was no arrangement for adequate supply of water, for housing and sanitation. In 1908, there was a serious outbreak of cholera when more than 12,000 deaths were actually recorded. This led to the creation of the Jharia Mines Board of Health in 1913 under Bengal Mining Settlement Act, 1912.

The Jharia Mines Board of Health covers an area of 797 square miles with a population of about 8 lakhs. Some parts of Neturia and Santuria thanas known as Chaurasi area and Bhojudih area of Para and Raghunathpur thanas of the Purulia subdivision of the Manbhum district with a total area of 80 square miles and a population of 38,000 persons were under its jurisdiction. After October, 1956, with the transfer of the Manbhum (Purulia) area to West Bengal the above areas have now gone outside the jurisdiction of the Board.

The Board has 11 members out of whom six are nominated by Government, four are elected representatives of mine owners and one represents the royalty receivers. These members control the activities of the Mines Board of Health in relation to the Public Health. The Secretary is a Government servant and of gazetted rank.

The Board covers 431 collieries, Jharia, one municipal town, colliery *bazars* and 1,669 villages. The main functions of the Board are—

- (i) Supervision of the housing labour.
- (ii) Sanitation of collieries, in *bazars* and to some extent in villages within the settlement.
- (iii) Extended sanitary services in Jharia town including cleaning of privies.
- (iv) Supervision of Medical Relief arrangements.
- (v) Prevention and control of epidemics on collieries and in villages within the Board's area.
- (vi) Sanitary supervision of all water-supplies and hospitals.
- (vii) Vaccination, both in colliery and rural areas.
- (viii) Registration of births and deaths in collieries and rural areas.
- (ix) Prevention of Food Adulteration.
- (x) Maternity and Child Welfare.
- (xi) Supervision of Anti-leprosy work.

(xii) Maintenance of Ambulance car for the use of collieries and the public.

(xiii) Propaganda by Magic lantern lectures.

Health activities of the Board are divided into different sections, namely, the Sanitary, Maternity and Child Welfare, Laboratory, Infectious Diseases Hospital and Public Health Propaganda sections.

Hospital.

The Board maintains an Infectious Diseases Hospital which is located at Chandakuiya. The total strength of the beds is 30. There are a medical officer, two nurses, one compounder, two ward attendants and two sweepers to look after the patients. In 1961-62, 572 patients were admitted in the hospital as against 518 in the previous year.

The Maternity and Child Welfare service of Jharia Mines Board of Health was organised in 1931. It is now serving a population of over three lakhs and covering an area of about 200 square miles. The current annual expenditure sanctioned for the year 1961-62 is Rs. 1,52,975 including Rs. 50,000 received from the Coal Mines Welfare Fund. The Board also receives grant for training of *dais* from the State Government under UNICEF scheme every year.

Water-Supply.

In 1961-62, three collieries were connected with Jharia Water Board mains. The total number of connected collieries were 223 in 1961.

Sanitation.

In 1962, there are 18 refuse carts, two conservancy lorries, two night-soil trucks and two tractors with trailers for collecting night-soil from small lanes and by-lanes at Jharia to cope with conservancy work of the Jharia bazar which is too much congested. There are 102 public latrines under the Board. The Medical Officer of Health is the *ex-officio* Inspector of Mines under the Indian Mines Act, 1923 in respect of matters relating to the health and sanitation of mines both over and under-ground within the district.

In 1960 and 1961, 2,85,324 persons were inoculated in villages, 1,57,614 persons in collieries and 1,38,965 persons in villages and 2,47,435 persons in collieries respectively.

Housing for Collieries.

The total number of standard houses for the collieries on 31st December 1961 was 36,032. The number is entirely inadequate for a population of over three lakhs in spite of the fact that many of the labourers come from the neighbouring villages where they live,

Finance.

The income of the Board consists of—

- (i) Tonnage cess from owners of mines levied on the average of the preceding three years.
- (ii) Royalty cess, by means of an assessment in proportion to the road cess payable by Royalty receivers.
- (iii) Latrine tax at Jharia.
- (iv) Fines in criminal cases instituted by the Board.
- (v) House rent, miscellaneous and other heads.

Rate of Cess and Tax.

The tonnage cess is levied at Rs. 6 per hundred tons of output. Latrine tax is levied at $71\frac{1}{2}$ per cent of the annual valuation of holdings at Jharia bazar.

The statement given below shows the receipt and expenditure of the Jharia Mines Board of Health from 1951-52 to 1961-62:—

Year.		Receipt. Rs.	Expenditure. Rs.
1951-52	..	7,79,849.81	8,32,464.69
1952-53	..	7,73,213.39	8,58,917.59
1953-54	..	8,53,848.65	9,03,325.91
1954-55	..	10,38,788.40	8,02,300.06
1955-56	..	8,80,029.27	8,94,545.96
1956-57	..	9,48,779.91	11,41,414.72
1957-58	..	10,25,461.56	10,21,832.88
1958-59	..	13,48,529.34	12,39,831.52
1959-60	..	10,67,104.51	11,24,846.34
1960-61	..	12,19,601.51	13,13,874.11
1961-62	..	12,26,938.89	13,33,831.63

From the statement of receipt and expenditure it appears that during the last decade the receipt has increased by five lakhs of rupees and similar increase in expenditure is also noticeable. In 1951-52, the receipt of the Board was Rs. 7,79,849.81. In 1951-52, the expenditure was Rs. 8,32,464.69 and during 1961-62 it amounted to Rs. 13,33,831.63.

SINDRI NOTIFIED AREA COMMITTEE.

The Sindri Notified Area Committee was constituted, vide Government notification no. 2159-L. S.-G., dated the 6th March 1953, with thirteen members who were nominated by the Government with General Manager, Sindri Fertiliser Corporation India, Limited, Sindri, as its *ex-officio* Chairman.

At present (1962), the Committee consists of 16 members who are nominated by the Government. The Chairman is the Managing Director of the Sindri Fertilizer Corporation India, Limited.

The area of the Committee extends over 15 square miles. The number of rate-payers is 60 including the Sindri Fertilizer Corporation of India, Limited.

The Committee has employed ten sweepers and three *mates*. Their main duty is to keep roads clean. There are also two Sanitary Inspectors to look after the sanitation work of the town. Besides these, the Sindri Fertilizer Corporation of India, Limited, looks after the sanitation work of the town. The road construction, lighting and water-supply arrangements are done by the Sindri Fertilizer Corporation India, Limited.

The Committee maintains one slaughter-house for goats at Rangamatia, one burning *ghat* at Sindri. The Committee is going to open 10 children parks in Sindri town. It has built only one middle school at Rangamatia.

The hospital and dispensaries are also controlled by the S.F.C.I.L.* unit.

The Committee has also employed one vaccinator, three Malaria Supervisors, 15 Anti-Malaria Field *Mazdoors* to check the epidemics and malaria. The statement given below shows the occurrence of epidemic, death and attack and the preventive measures taken by the Committee in the recent years:—

Year.	Small-pox.		Cholera.		Vaccination.			
	Attack.	Death.	Attack.	Death.	Inoculation.	Primary.	Revaccination.	
1	2	3	4	5	6	7	8	
1958	3	Nil	1	Nil	1,991	341	40,992	
1959	1	Nil	Nil	Nil	2,802	1,775	13,672	
1960	1	Nil	Nil	Nil	1,334	606	5,539	
1961	Nil	Nil	Nil	Nil	4,654	583	7,643	
1962	Nil	Nil	Nil	Nil	5,278	427	5,979	
(Up to August).								

The main sources of income of the Committee are holding tax, Government loans, grant of licenses for carrying on food and offensive and dangerous trade. The holding tax is levied at the rate of $7\frac{1}{2}$ per cent on the annual value of the holding, the total number of holding is 4,423.

* Sindri Fertilizer Corporation India, Limited.

The following statement shows the receipt and expenditure of the Committee from 1953-54 to 1961-62:—

Year.	Receipt. Rs.	Expenditure. Rs.
1953-54 ..	75,000.00	1,367.70
1954-55 ..	1,26,244.08	15,203.40
1955-56 ..	1,60,591.25	80,128.22
1956-57 ..	1,10,276.14	1,78,790.62
1957-58 ..	2,97,198.61	1,08,599.30
1958-59 ..	1,75,439.17	1,44,958.62
1959-60 ..	1,76,921.50	29,248.44
1960-61 ..	1,37,919.91	80,487.61
1961-62 ..	2,03,810.56	1,40,007.00

From the statement it appears that receipt and expenditure have both increased within ten years. During 1953-54, the receipt was Rs. 75,000 which had increased to Rs. 2,03,810. The expenditure during 1953-54 was Rs. 1,367.70 which increased to Rs. 1,40,007 due to the construction of school, burning *ghat*, etc.

GRAM PANCHAYAT.

The *Gram Panchayat* or *Gram Sabha* is an old indigenous institution in some parts of the country. In Bihar also the village *Panchayats* existed long before the British Administration although their functions varied in different areas. Usually, the *Gram Panchayats* were more associated with the solution of the social problems and were not normally entrusted with the collection of rent for the zamindars or for rendering justice—civil or criminal. The tempo of the existence of the *Gram Panchayats* usually depended on the local zamindars. It is the zamindars who were more responsible for the decline of the importance of the *Gram Panchayats*. The permanent Settlement System and the zamindars became very powerful even in the matters of law and order. In the early days of British Administration the zamindars in Bihar were also entrusted with a part of the police work and used to maintain *chaukidars* and often ran zamindari police thanas parallel to the police thanas in other areas run by the Government. With the institution of the zamindars and a highly centralised system of administration at the district headquarters, there was very little scope for the functioning of the *Gram Panchayats*. Even before the British Administration stepped in, the *Gram Panchayats* had started declining because of the weakness of the ruling power and increase of authority of the zamindars. The development of the means of communications also did away with much of the importance of the *Gram Panchayats*. Any aggrieved person could quickly go to the thana headquarters or to the subdivisional headquarters with their grievances and either the police or the Magistrate would look their alleged grievances. All this contributed to the breakdown of the village community life,

It is doubtful if the *Gram Panchayats* that existed in Bihar before the British Administration looked after the village sanitation, public health, education, etc. As mentioned before there was a *Panchayat* of village elders who would occasionally meet and pull up the social delinquents and give a rough and ready justice to some criminal offenders if the parties approached them or were amenable to their orders. The character of the State was of the type of a Police State and the village *chaukidar* as the representative of the Police Administration in the village became a very important person. A village *chaukidar* had a lot of nuisance value and he could easily implicate others. He was an almost all-purpose agent of the Government. If there was to be a census of wells, palm trees or livestock, it is the *chaukidar* who would be asked to give the figure. It is the *chaukidar* who had to report the vital statistics of the village. He had to distribute the cholera or the malaria pills. The *chaukidar* again represented the law and order for and on behalf of the administration. It is the overall prestige and power of the *chaukidar* that reflected the character of the Police State type of administration. It has to be remembered that in Bihar villages there was no revenue agent of the administration.

Under Act VI of 1870 an attempt was made to associate the *Panchayats* with the conduct of the *chaukidari* system. The provision of the Act was extended to the rural units to seek the co-operation of the villages. But they were mere agencies for the assessment and collection of *chaukidari* taxes. There was no other vital link of the villages with the administration. As Mr. R. C. Dutt, I.C.S., the great economist-scholar and administrator, had observed in his presidential address at the session of the Indian National Congress in 1899, there was practically no living touch in the village administration between the rulers and the people and the only link between the administration and the people in civil administration was the hated link of the police. The police, as mentioned before, was the link even for social matters, educational problems or for the distribution of quinine or for carrying on vaccination. With the great nuisance value of the police, naturally the people had an allergy against them. That is why Mr. R. C. Dutt had advocated that the village unions should be made the real centre of village administration, but Dutt's wise suggestions were not accepted by the then British Government.

The report of the Royal Commission on Decentralisation in 1909 made the following observations:—

“That the foundation of any edifice which will associate the people with the administration must be the village as being the area of much antiquity than the new administrative creations and one in which people are known to one another. And it is most desirable alike in the interests of decentralisation and in order to associate the

people with the task of the administration that an attempt should be made to constitute and develop village *Panchayats* for the administration of local affairs."

The Commission had suggested a certain allocation of funds out of land cess, of receipts from village cattle pounds to the village *Panchayat* and recommended the reconstitution of the village *Panchayat* with powers to try petty civil and criminal cases, to look after minor village works, to control primary schools and to manage fuel and fodder reserves. In 1915, the Report of Bengal District Administration Committee also recommended that *Panchayats* should be reinvested with the supervision and control of *chaukidars* operating within their local jurisdiction and made the following suggestions:

- (i) To reform local bodies on the principle of indirect elections beginning from the village upwards.
- (ii) To entrust local defence to village *Panchayats* with powers of taxation to meet local needs.

Many experiments had to be tried before the British Government were driven to the conclusion that the old *Panchayats* must be resuscitated in some form or another. It was not till 1920 that an earnest effort was made by the Provincial Government to resuscitate the village *Panchayats* in the light of the broad principles enunciated in the Government of India Resolution of 1915. As a result, in 1920 the Village Administration Act was passed to revive the old institution of the village assembly. It, however, did not make a quick headway.

The Indian Statutory Commission in its report published in 1930 (commonly known as the Simon Report) appreciated the importance of the village *Panchayats* and observed that the *Panchayat* movement had not made any marked progress. It mentioned that the village *Panchayat* was of special interest and importance as being an attempt to recreate the village as a unit of self-government.

A critical study of the historical factors will show that probably it was not possible for the British Government at its very advent to take steps to revive the village *Panchayats*. This was so because the backbone of the village *Panchayats* had already been shattered. The realisation that the *Panchayats* should be revived in some form or the other came to the British administrators quite early but there was a long period of avoidable hesitation. As the administration was a centralised one, they took steps first to introduce Local Self-Government at the urban areas through municipalities, etc. The Local Self-Government ideas were also introduced through the District Boards and after a certain amount of progress had been achieved, it was decided to take up the village *Panchayats*. Certain experimental measures had already been taken before the British administration came to an end on 15th of August, 1947.

The extension of the *Panchayats* and the wave of enthusiasm with which the elections were fought just before the country got her independence made it quite clear that the villages could no longer

be ignored. One of the secrets of the success of the Congress Party was the underlining of the importance of the villages. The early Congress leaders had taken care to shape the public opinion of the citizens of the urban areas. The Congress Movement under Gandhiji took the fight for independence to the villages and the Congress Party was voted to victory in an overwhelming manner in Bihar and in various other provinces through the votes of the villagers. It was felt that without a revival of the *Panchayat Raj* in some shape or the other, the independence that has been won would have had little significance to the millions living in the villages. The organisation of village *Panchayats* was made one of the directive principles of the State Policy in the written Constitution of India. Article 40 of the Constitution lays down that the State shall take steps to organise the village *Panchayats* and endow them with such powers and authority so that they could function as units of Self-Government.

The task of revival of the *Panchayats* was wisely left to the States and was not made into a Central subject. The Bihar Panchayat Raj Act, 1947, was passed and received the assent of the Governor-General on the 12th June 1948. This Act partially confirms the recommendations made in the report of the Bengal District Administration Committee in 1950. The Act, however, does not cover all the recommendations either of the Royal Commission on Decentralisation or of the Bengal District Administration Committee. The Bihar Panchayat Raj Act, 1947, cannot be said to be a new product nor can it be said to confer wider powers and duties which were contemplated in 1904 and later on in 1909 by the Royal Commission on Decentralisation and in 1915 by the Bengal District Administration Committee.

Normally, a *Panchayat* is formed to cover an area which has a total population of 4,000 persons. Usually, the number of villages falling within the radius of two miles are grouped into one *Panchayat*. The *Gram Panchayat* is mainly an elective body and is headed by a *Mukhiya* who corresponds to the President of the schemes proposed in 1904 representing the executive authority of the *Panchayats*. The *Mukhiya* is assisted by an Executive Committee consisting of eight members, four of whom are elected and four are appointed by the *Mukhiya*. While appointing the members of the Executive Committee, the *Mukhiya* is required to take into consideration the claim of the members of the Scheduled Castes, Scheduled Tribes and females. The term of the office of *Mukhiya* or a member of the Executive Committee would vary from three, four or five years according to the gradation of the *Gram Panchayats*.

There is a panel of nine *Panches* or members with a head known as the *Sarpanch*. Four *Panches* are elected and four *Panches* are nominated by the joint meeting of the *Sarpanch*, elected *Panches* and all the elected members of the Executive Committee excluding the *Mukhiya*.

A person is considered disqualified for election, nomination or appointment as *Mukhiya* or a member of Executive Committee, *Sarpanch* or *Panch* if such a person—

- (a) is not a subject of India,
- (b) is in the service of the Central or State Government or any local authority,
- (c) has been adjudged by a competent court to be of unsound mind,
- (d) is under twenty-five years of age, and
- (e) does not reside in the *Gram Panchayat* area for at least one hundred and eighty days in the aggregate in a calendar year, has been convicted by a criminal court, is a leper or a person suffering from tuberculosis or is in the arrears of any tax, toll and fee.

The Government may remove the *Mukhiya* or any other member of the Executive Committee for misconduct, incapacity or neglect of duty on the recommendation of the prescribed authority.

There are 10 *Anchals* in this district under which 100 revenue *halkas* or units have been created. Within these *halkas*, 203 notified *Gram Panchayats* have been formed. Out of 1,626 villages in the district 1,612 villages have been covered by the notified *Gram Panchayats*. To cover all the villages, 8 more *Gram Panchayats* are required to be notified. Out of 203 established *Gram Panchayats* 171 *Gram Panchayats* have been entrusted with the rent collection work. The statement given below shows the number of notified *Gram Panchayats*, number of villages and total population covered subdivisionwise for the years 1959-60 and 1960-61.

Statement showing the number of notified *Gram Panchayat* villages and total population, etc.

Year	Name of the subdivision.	No. of notified <i>Gram Panchayats</i> .	Total number of notified <i>Gram-Panchayats</i>	No. of villages covered by all the notified <i>Gram-Panchayats</i> .	Total population covered by all the notified <i>Gram-Panchayats</i> .	No. of villages still to be covered by the notified <i>Gram-Panchayats</i> .
1	2	3	4	5	6	7
59-60	.. Sadar ..	109	109	985	4,40,682	10
	Baghmara ..	94	94	627	3,30,874	4
60-61	.. Sadar ..	109	109	985	4,40,682	10
	Baghmara ..	94	94	627	3,30,874	4

Sources of Information—From Annual Reports, Form I.

The District Panchayat Officer, who is a Gazetted Officer, is the administrative head of this institution and works under the superintendence and control of the District Magistrate. He is also under the administrative control of the Director of the *Gram Panchayats*. The District *Panchayat* Officer manages the work with the assistance of five Supervisors, three Instructors of village Volunteer Force, besides 203 *Panchayat Sewaks*.

Section 26 of the Bihar Panchayat Raj Act provides for the organisation of the village volunteer forces in the villages under the command of the Chief Officer. There are 164 Chief Officers in the district. All able-bodied males of the villages between the age-groups of 18 to 30 could be the members of the forces. In any emergency the village volunteer forces are to protect the village from dacoits, fire, epidemic, etc. Till March, 1962, 7,070 members of the village volunteer forces have been trained in this district under the guidance of the Chief Officers. The main functions of the Instructors are to organise night patrolling and to impart training to village volunteer force. The *Panchayat Sewaks* are at the lowest level of the *Panchayat* organisation and are paid Government servants. They assist the *Mukhiyas* in maintaining registers and statistics in rent collection and they also function as a bench clerk of the *Sarpanch*.

Finance Resources.

The *Gram Panchayats* have been empowered to raise taxes such as professional and property taxes. The other source of income of the *Gram Panchayat* is the grant sanctioned by the Government. An initial grant of Rs. 50 to each *Gram Panchayat* has been sanctioned by the Government. One hundred and seventy-one *Gram Panchayats* have been empowered to collect rent on commission basis. In 1960-61, the *Gram Panchayats* collected Rs. 3,180.58 from property tax against the total demand of Rs. 13,107.43 and received Rs. 12,890 as commission for rent collection.

Function.

Under the Bihar Panchayat Raj Act, 1947 (amended up to 1959), the primary functions of the *Gram Panchayat* relate to sanitation and conservancy, organising voluntary labour for community work, cleansing and disinfection of sources of water, construction, maintenance, protection and improvement of village roads and maintaining record of vital statistics, the lighting of public streets, primary education, registration of births and deaths, etc. The planting and maintaining trees on the sides of public streets, the construction of wells, ponds and tanks, introduction and development of co-operative farming, stores and other trades, establishment of libraries and reading rooms, organisation and maintenance of gymnasiums (*Akharas*), clubs and other places of recreational games are some of the important supplementary duties of the *Gram Panchayat*.

Administration of Justice.

Gram Cutcheries of the *Gram Panchayats* have been given certain powers to discharge administration of justice. The first duty of the *Gram Cutchery* is to try and bring about a compromise. Failing a compromise, the *Gram Cutchery* takes up the trial and it is expected that justice will be given in a cheap, quick and efficient manner. It was expected that witnesses will dispose truthfully in the village courts and much of the formalities will be cut out. It was also expected that the function of the *Gram Cutchery* for administration of justice would lead to a lesser number of complaints before the Magistrate or the police. But as a matter of fact, this expectation has not been fulfilled. It has been found that villagers still prefer to go to the Subdivisional Magistrates' courts. Usually, the litigants allege partisanship with the *Sarpanch*.

The number of *Gram Cutcheries* in the district is 203 and all are functioning. The details regarding the number of cases instituted, number of cases disposed of, number of suits instituted, number of suits disposed of, etc., have been dealt with in the Chapter "Law, Order and Justice".

CHAS UNION COMMITTEE.

Chas is a growing township in Chas police thana and has a population of 1,10,549 persons according to 1961 census. The Union Committee which was established in 1915 looks after the sanitation conservancy, pounds, registration of births and deaths, village roads and wells of Chas which covers an area of six square miles. The Committee consists of nine members out of whom six are elected and three are nominated by the Government. The Chairman is elected. The Committee exercises above powers under the control of the District Board. The Committee has one sanitary *jamadar* and eight sweepers for sanitation work.

Income and Expenditure.

The figure for receipt and expenditure from year 1956-57 to 1960-61 is given below:—

Year.		Receipt.	Expenditure.
		Rs.	Rs.
1956-57	..	4,387.00	4,131.00
1957-58	..	6,448.40	4,423.73
1958-59	..	7,927.60	7,514.04
1959-60	..	6,076.87	5,540.29
1960-61	..	6,414.46	6,097.53

CHAPTER XII.

EDUCATION AND CULTURE.

PROGRESS OF EDUCATION.

The district of Dhanbad, which was a sub-district since 1921 within the district of Manbhum for all administrative purposes, gained the status of a full-fledged district from 1st November 1956. It includes the old sub-district of Dhanbad and the Chas revenue *thana* from Purulia.

Regarding progress of education it is mentioned in the old *Gazetteer of Manbhum** (page 259) that in 1866 there were two un-aided secondary institutions at Jharia and Pandra founded by Raja Durga Prasad Singh and the late Rani Hingan Kumari which had 88 and 118 pupils respectively. The demand for education was confined to the middle class of people only. The people generally were averse to pay any fees at the schools and throughout they were entitled to receive free education from the Government. The landlords did not think it any obligation to found or run educational institutions normally.

The statistics below for Dhanbad district with Chas and Chandankiary *thanas* since 1911-12 to 1961-62 supplied by Education Department, Dhanbad, will indicate the progress of education:—

Year.	No. of schools.	No. of scholars.
1911-12	319	10,936
1916-17	390	12,838
1921-22	391	13,645
1926-27	395	18,733
1931-32	452	18,243
1936-37	432	19,571
1941-42	449	25,124
1946-47	478	29,895
1951-52	778	54,374
1956-57	928	64,425
1961-62	1,184	1,21,148

The schools included in the above table are of various types, i.e., Primary, Middle, Secondary and Girls' Schools.

The figures quoted above show that in the quinquennium 1911-12 to 1916-17 there was an increase in the number of schools from 319 to 390 as well as in the scholars from 10,936 to 12,838. The position from 1916-17 to 1926-27 did not mark any remarkable growth in the number of schools but the number of scholars was on the increase.

* *District Gazetteer of Manbhum* by H. Coupland (1911).

In 1931-32 the number of schools rose to 452 but there was a decline in the number of students being 18,243 only against 18,733 scholars reading in 395 schools in 1926-27. This decrease in number of scholars was said to be due to the fact that the number of primary schools had increased to a great extent being 366 in 1926-27 to 423 in 1931-32. During 1936-37 to 1941-42 there was a decrease in the number of institutions and it stood at 432 and 449 as against 452 in 1931-32. This is ascribed to the disappearance of smaller and inefficient institutions under the pressure of competition. This decrease was mainly centralised in the sphere of primary schools. The year 1951-52 was an important year during which there was a rise in both the number of schools as well as in the number of pupils. The number of schools was 778 with 54,374 scholars on roll as against 478 schools with 29,895 scholars in 1946-47. In 1956-57 there was an increase in the number of schools as well in scholars when it reached 928 and 62,425 respectively and in 1961-62 it reached 1,184 and 1,21,148 scholars.

Apart from the progress in education through the conventional line of teaching, there has been a number of institutions for imparting what has come to be known as Basic Education and Social Education. One hundred and seven Basic schools and one hundred and sixty social education centres are now functioning in the district. The system of Basic education was introduced in the district in 1948 on an experimental basis at Pindrajora. Crafts, agriculture, manual work and physical training find an important place in the syllabus. Extra-curricular activities are given prominence.

A comprehensive rural uplift programme is sought to be executed through Basic schools and social education centres. This programme consists of (1) rural cleanliness, (2) social uplift work, (3) demonstration of the scientific, agricultural and cottage industries developments, (4) processes showing how science may be correlated to these operations with marked success, (5) disinfection of wells, (6) providing social recreation to the communities, (7) developing their aesthetic faculties, (8) utilisation of compost pits, urinals and trench latrines, and (9) relief work through *Khadi* production. It cannot, however, be said that basic education has been popular or has struck roots in spite of a large sum annually sunk by the State over this. This system of education has been recently severely criticised by some of the scholars in the country and it is said the objective has failed because of faulty working.

So far social education is concerned, originally it was started as a mass literacy drive in 1938-39. The Mass Literacy Campaign and Adult Education Drive have come to be known as the Social Education Scheme. Through the social educational centres it is expected that illiteracy will disappear and there will be a general social uplift. The Community Development Projects and Blocks have taken

up this work actively. The objective is great, no doubt, but it is not known how far the objective has succeeded. No appraisal was made.

It may be noted that there have been certain important changes in the field of education in recent years in the State and Dhanbad has not been an exception. The District Board has been absolved of its responsibility to impart education to a great extent and this task has been taken over by the State. This scheme was implemented in this district in May, 1957. The District Education Fund was put under the District Superintendent of Education. Regarding stipendiary and aided schools the power of the District Board has been almost reduced to nullity. The record of the progress of education under the District Board was not good although large figures used to be reported. In most of the schools there were complaints of various types and that is why the change in the control and administration was made.

There has also been some change in the field of secondary education. Higher Secondary Course was introduced in 1958 in the district and seven schools have been converted into higher secondary schools. The higher secondary schools will now teach up to the first year standard of Intermediate Classes and the colleges will have only three years' Degree course. It is expected that more and more of the better managed secondary schools will be raised to this status.

Incidence of Literacy.

Regarding the incidence of literacy in the district it was mentioned in "*District Census Hand-Book of Dhanbad, 1951 (P.V.)*" that among the districts of Bihar, Dhanbad had the highest literacy percentage. Out of a population of 7.3 lakhs, 1.3 lakhs or 17.8 per cent were literate, and the remaining 6 lakhs or 82.2 per cent, illiterate. If persons aged five years and above only were taken into consideration, the literacy percentage came to 19.5. The proportion of literates was highest (23 per cent) among persons aged between 15 and 35 years and lowest (15 per cent) among people aged 45 and above. In urban areas, 42.5 per cent of the population, i.e., 425 persons per mille were literate and in rural areas, only 15 per cent, i.e., 150 persons per mille. Among females, only 7 per cent were literate and 93 per cent illiterate: while, among males, 26 per cent were literate and 74 per cent illiterate. The reasons for disparity are obvious. Though the number of primary schools increased in the villages, only the younger generation benefited from them while the adults who were illiterate or semi-illiterate remained almost where they were in spite of the recently started adult social centres. It is generally found that for the average small cultivator, a young boy is an assistance in the field, and so he does not seem to be very keen for schooling for the boy specially where the school is at some distance from the village. This is all the more true in the case of young girls who do not go long distances unescorted.

But there has been some change. In the two Five-Year Plans, two hundred and forty schools and one hundred and forty social education centres have been started and their number will considerably increase in the Third Five-Year Plan.

The spread of education in Dhanbad district may be reviewed in the background of the spread of education in the State and in the country. According to the 1961 Census, the percentage of literacy and education in Bihar works out to 18.4 for the total population, 29.8 per cent for the male population and 6.9 per cent for the female population, as against All-India averages of 24.0 per cent, 34.4 per cent and 12.9 per cent respectively. The spread of education in Bihar cannot be said to be phenomenal and in fact, there are only four States in India, viz., Uttar Pradesh, Madhya Pradesh, Rajasthan and Jammu and Kashmir which have lower literacy rates. It does, however, give some satisfaction to note that the last decade has noticed significant improvement on the 1951 figures which were 12.2 per cent, 20.5 per cent and 3.8 per cent respectively.

According to 1961 Census among the districts of Bihar, Patna tops the list with the percentages of 28.7, 43.5 and 13.0 respectively for total male and female literacy. The district of Dhanbad follows next with the corresponding figures of 25.5 per cent, 37.2 per cent and 10.7 per cent respectively. Both these districts have literacy percentages higher than the All-India averages. The district of Champaran is at the bottom with only 13.2 per cent literates. Palamau with 13.6 per cent, Saharsa with 14.0 per cent literacy are not much better. In fact, female literacy is the lowest in Palamau and Saharsa districts.

Education among Scheduled Castes, Scheduled Tribes and Backward Classes.

The population of the Scheduled Castes, Scheduled Tribes and Backward Classes in the entire district based on the report of 1951 census of the *District Census Hand-Book*, Dhanbad, published in 1954 at page 77 was as follows:—

	Males.	Females.	Total.
Scheduled Castes ..	62,504	51,934	1,14,438
Scheduled Tribes ..	57,137	57,892	1,14,529
Backward Classes ..	45,803	38,842	84,645

The total population of Dhanbad district according to 1951 census is 7,31,700. The population of the three categories alone comes to 42.8 per cent of the total population.*

*It has to be remembered that the 1951 Census figures for Dhanbad is for the sub-district of Dhanbad and not those of the Dhanbad district as it stands today with areas of Chas and Chandankiary. The total population of the readjusted district of Dhanbad according to 1951 Census is 9,05,783 as against 7,31,700 of the Dhanbad sub-district. Detailed figures for 1961 Census are not still available and so 1951 Census figures have been taken (P. C. R. C.).

They are distributed all over the district. For the welfare of the Scheduled Castes, Scheduled Tribes and Backward Classes the State Government have appointed one District Welfare Officer, one Assistant Welfare Officer and seven Welfare Inspectors in 1948. These officers have the responsibility for the spread of education amongst the Scheduled Castes and Tribes and the Backward Classes.

The State Government have arranged to give students of these categories, stipends, exemption from school fees and book-grants.

The following table supplied by Education Department gives the data in connection with the progress of special schools, i.e., primary schools for these classes of students:—

Schools for Scheduled Castes.

Years.			Number of schools.	Number of scholars.
1958-59	..	..	22	987
1959-60	..	..	43	1,422
1960-61	..	..	43	1,510

Schools for Scheduled Tribes.

Years.			Number of schools.	Number of scholars.
1958-59	..	..	10	497
1959-60	..	..	11	521
1960-61	..	..	11	602

There is no special school for Backward Hindu Community. Besides the above enrolment the number of students in general schools numbered about 9,450 including girls in 1960-61. Students belonging to the above classes and the Backward Hindu Communities are awarded special scholarships and book-grants from the Welfare Department.

There are also general scholarships for which selected pupils of middle and primary schools compete. There are 44 scholarships awarded by the District Board for boys and girls termed as lower primary scholarship valued at Rs. 3 per mensem tenable for two years. Besides, there are merit-cum-poverty scholarships numbering 58 for students reading in VI to XI class at the rate of Rs. 10 for middle schools and Rs. 15 for high schools.

The following statement of stipends granted by the Welfare Department to the students of Scheduled Castes and Tribes and the

Backward Classes has been obtained from the District Welfare Office:—

Scheduled Tribes.

Years.			Number of stipends.	Total expenditure incurred. Rs.
1960-61*	..	..	816	61,967.55
1961-62	..	..	1,094	1,74,072.00

Scheduled Castes.

Years.			Number of stipends.	Total expenditure incurred. Rs.
1960-61	..	..	1,674	99,176.00
1961-62	..	..	2,001	1,77,711.96

Backward Communities.

Years.			Number of stipends.	Total expenditure incurred. Rs.
1960-61	..	..	849	2,10,425.00
1961-62	..	..	1,315	2,56,991.00

GENERAL EDUCATION.

Primary Education.

Regarding primary education, H. Coupland in the *Old Gazetteer of Manbhum* (1911) mentioned that the total number of primary schools for boys in the district of Manbhum was 676, of which 73 were upper primary and 603 were lower primary. With the exception of four upper primary schools attached to the *guru* training schools, all were under private management, 561 being aided and 111 unaided. The attendance at these schools was 22,585, viz., 21,435 boys and 1,150 girls. Upper primary schools were usually accommodated in buildings specially provided for them, but in the majority of cases such buildings were very unsuitable for the purposes. With few exceptions lower primary schools had no regular buildings and were generally held in the common *puja* house of the village, or on the verandah of some comparatively well-to-do villager's house. With a Government aid of Rs. 15,500 and funds subscribed locally by the District Board 18 model school buildings were constructed of which 12 were intended for upper primary and six for lower primary schools.

*It was unfortunate that the District Welfare Office could not supply the earlier figures.

It may be noted that separate figures for primary schools for Dhanbad district before 1911 are not available. Separate statistics for the district of Dhanbad including the two transferred *thanas* of Chas and Chandankiary are available from 1911-12.

There has been some progress in the incidence of primary education since the time of H. Coupland. In the year 1953-54 two important steps were taken. The first is the enforcement of Expansion Improvement Programme Schemes, which helped the problem of the educated unemployed and established schools in the district on an equitable distribution basis keeping in view the areas and the number of population for whom these schools were meant. The second is the promulgation of the Local Self-Government Amending and Validating Act, 1954, which put an end to the dual system of administration in the field of education to a considerable extent. Before 1954, the primary schools were controlled both by the local bodies and officers of the Education Department. The powers of the Local Bodies in the matter of payment, etc., were vested with the District Superintendent of Education (Elementary) who was later designated as District Superintendent of Education.

Several schemes, namely, Expansion Improvement Programme, introduction of intensive teaching craft in middle schools were in operation during 1954. Under Expansion Improvement Programme, new schools (primary and middle) are opened and the existing schools are upgraded and improved.

Under intensive teaching craft in middle school, it is reported that about seven middle schools have been provided with teaching craft (1962). The view in general was to permit equal facility to one and all in matter of education. All these factors contributed to a great rise in the number of primary schools during the years 1961 and 1962.

THE FOLLOWING TABLE SUPPLIED BY EDUCATION DEPARTMENT WILL SHOW THE TREND OF PRIMARY EDUCATION IN THE DISTRICT FROM 1911-12 TO 1961-62.

Years.	Number of schools.			Number of scholars.			Number of teachers.			
	Boys.	Girls.	Total.	Boys.	Girls.	Total.	Males.	Females.	Total.	
1	2	3	4	5	6	7	8	9	10	
1911-12	N.A.	301	N.A.	N.A.	9,654	N.A.	N.A.	N.A.
1916-17	N.A.	369	N.A.	N.A.	11,293	N.A.	N.A.	N.A.
1921-22	N.A.	366	N.A.	N.A.	11,542	N.A.	N.A.	N.A.
1926-27	N.A.	366	N.A.	N.A.	16,031	N.A.	N.A.	N.A.
1931-32	N.A.	423	N.A.	N.A.	15,193	N.A.	N.A.	N.A.
1936-37	N.A.	399	N.A.	N.A.	15,663	N.A.	N.A.	N.A.
1941-42	N.A.	406	N.A.	N.A.	20,094	N.A.	N.A.	N.A.
1946-47	N.A.	438	N.A.	N.A.	21,131	N.A.	N.A.	N.A.
1951-52	N.A.	704	N.A.	N.A.	38,603	N.A.	N.A.	N.A.
1956-57	683	730	30,759	6,015	36,774	1,093	66	1,159
1957-58	681	730	34,215	6,348	40,563	1,168	62	1,230
1958-59	715	768	36,317	9,405	45,722	1,230	47	1,277
1959-60	761	815	31,254	10,666	41,920	1,314	50	1,364
1960-61	810	866	42,347	10,866	53,213	1,375	65	1,440
1961-62	826	883	65,910	142	..	1,437	64	1,501

N.A.—Not available. The paucity of statistics is regrettable (P. C. R. C.).

During the First and Second Five-Year Plans there had been great improvement in primary education in the district. The number of primary schools had increased considerably, upgrading of lower primary schools into upper primary schools had been effected in sufficient numbers, funds had been sanctioned for the construction of new buildings and renovation of existing ones. The scale of salary of teachers had been considerably upgraded. The scheme of appointment of lady teachers in primary schools was sanctioned and qualified ladies had been appointed in primary schools. According to the announcement of State Government in 1949, education up to primary stage was made free throughout the State.* To compensate the loss of free-income the scale of pay of teachers was revised and higher scales were fixed.

Compulsory primary education had been introduced at Topchanchi in 1959 and Govindpur in Dhanbad in 1960. In 1961-62 the percentage of boys attending school as compared to the children of school-going age comes about 30 per cent. The percentage of boys attending the school is not very inspiring in spite of the employment of Attendance Officers and proper teachers. Compulsory primary education has not evoked a proper response from the common man. The economic condition of the poorer people stands on the way. Many of the children near about ten years of age work for supplementing the family income.

Middle Schools.

Till 1911 the middle schools were divided into two classes: (a) Middle English Schools, i.e., schools teaching up to middle scholarship examination in which English formed part of the course, and (b) Middle Vernacular schools, i.e., schools which taught up to middle scholarship examination but where English was not taught. After 1911 such distinction of middle schools came to an end and there were no middle vernacular schools.

Separate statistics for the district of Dhanbad including the two transferred *thanas* of Chas and Chandankiary are available from 1911-12.

* It is doubtful if this is being properly implemented (P. G. R. C.).

THE FOLLOWING TABLE SUPPLIED BY EDUCATION DEPARTMENT, DHANBAD SHOWS THE EXPANSION OF MIDDLE SCHOOL DURING 1911-12 TO 1961-62.

Years.	Number of schools.			Number of scholars.			Number of teachers.		
	Boys.	Girls.	Total.	Boys.	Girls.	Total.	Boys.	Girls.	Total.
1	2	3	4	5	6	7	8	9	10
1911-12	N.A.	N.A.	6	N.A.	N.A.	N.A.
1916-17	N.A.	N.A.	6	N.A.	N.A.	N.A.
1921-22	N.A.	N.A.	6	N.A.	N.A.	N.A.
1926-27	N.A.	N.A.	9	N.A.	N.A.	N.A.
1931-32	N.A.	N.A.	9	N.A.	N.A.	N.A.
1936-37	N.A.	N.A.	10	N.A.	N.A.	N.A.
1941-42	N.A.	N.A.	15	N.A.	N.A.	N.A.
1946-47	N.A.	N.A.	27	N.A.	N.A.	N.A.
1951-52	N.A.	N.A.	42	N.A.	N.A.	N.A.
1956-57	55	4	59	8,943	2,141	11,084
1957-58	57	4	61	9,324	2,480	11,804
1958-59	63	5	68	10,918	4,168	15,086
1959-60	67	6	73	13,544	4,347	17,891
1960-61	79	7	86	18,962	5,303	24,265
1961-62	82	8	90	17,167	5,776	22,943

N.A.—Not available. The paucity of figures is regrettable (P. C. R. C.).

The control of middle schools was entirely transferred to the District Board in 1925 but after the promulgation of the Amending and Validating Local Self-Government Act in 1954, the District Superintendent of Education in the district had been made responsible for the control, management and payment to middle and primary schools in District Board area. The control of such schools by local boards of the respective subdivision did not have a salutary effect and was rightly terminated. A District Education Fund was opened in 1954 in which the contributions of the District Board and Education Department were pooled together and expenditure incurred. A District Planning Committee was set up in 1954 with the Deputy Commissioner as President and the District Superintendent of Education as Secretary and members nominated by the Education Department. The Committee was made responsible for the opening of new schools, appointment of teachers and other work relating to the expansion of middle and primary schools in the district.

Secondary Education.

The establishment of Universities in the year 1857 had far-reaching consequences on secondary education.

Certain specific defects had grown out of the system of secondary education in vogue during the years 1854–1882, the mother-tongue was completely neglected as a medium of instruction, nothing was done to train teachers for the secondary schools, and the course of study became too academic and unrelated to life mainly because there was no provision for vocational or technical courses. One further defect that had now taken concrete shape was that the Matriculation Examination began to dominate, not only secondary education but even the education imparted in primary schools.

In 1882 an education commission, known as the *Hunter Commission*, was appointed by the Government to report on the entire question of education in the country. The Commission was directed to enquire into the quality and character of the instruction imparted in schools.

Since it was very costly for the Government to maintain secondary schools it was thought that the entire responsibility of primary education should be taken over by the Government and the secondary education should be left to private enterprise. The Commission recommended that secondary education should be provided on the grant-in-aid basis and that the Government should withdraw as early as possible from the direct management of secondary schools. The recommendations were not, for some reason or other, implemented.

During 1882–1902 there was a considerable expansion in the field of secondary education. It was partly to the enthusiasm of private enterprise and partly to the system of grant-in-aid.

The system of education in vogue, however, made the problem of unemployment all the more acute as the Universities were thrown open to all types of students and most of those who passed through the Universities were fit for white collar jobs only. Technical education was at a low premium and manual labour came to be despised. In later years attempts have been made to meet this problem. From time to time different committees have been formed at various levels to go into this question. One of them was the University Education Commission in 1948 under the Chairmanship of Dr. S. Radhakrishnan. The Commission recommended that the standard of admission to University courses should correspond to that of the present Intermediate examination, i.e., after 12 years of the study at the school and Intermediate College. The Commission thought that neither the public nor the Government had realised the importance of Intermediate Colleges in the Indian Educational system, and remarked that "Our Secondary Education remains the weakest link in our educational machinery and needs urgent reinforcement." Till the formation of the Secondary School Examination Board in 1951 all the Secondary Schools were under the control of Patna University and the Matriculation Examination was conducted by Patna University.

There has been an improvement in the incidence of Secondary Education. The old statistics indicating the progress of Secondary Education are unfortunately not available. The figures from 1956 to 1961 supplied by Education Department have to be looked into to mark the progress. It may be mentioned that in the Second Five-Year Plan period seven high schools were converted into Higher Secondary and Multi-purpose schools.

It has to be mentioned here that the expansion of schools and the increasing number of scholars do not necessarily mean substantial progress if the standard is allowed to go down. It is commonly complained that there has been a lamentable deterioration of standard and half-baked students are being turned out by half-baked teachers and these half-baked students and teachers are becoming a problem. The matter has become serious and is engaging the attention of the public and the State Government. The students are mostly indisciplined and the teachers are ill-paid. The living touch between the teacher and the student is getting lost in the number of students, maize of subjects plethora of curricula and interference by management.

THE FOLLOWING TABLE SUPPLIED BY EDUCATION DEPARTMENT SHOWS THE EXPANSION OF SCHOOLS FOR
SECONDARY EDUCATION FROM 1956-57 TO 1961-62 :—

Years.	Number of schools.			Number of scholars.			Number of teachers.				
	Boys.	Girls.	Total.	Boys.	Girls.	Total.	Males.	Females.	Total		
1	2	3	4	5	6	7	8	9	10		
1956-57	20	1	21	8,152	1,005	9,157	291	25	316
1957-58	20	3	23	8,394	1,202	9,596	300	43	343
1958-59	23	3	26	9,356	1,156	10,512	260	36	296
1959-60	28	3	31	9,690	1,305	10,995	315	38	353
1960-61	30	3	33	10,540	1,513	12,053	339	44	383
1961-62	29	3	32	9,350	1,771	11,121	306	43	349

Higher Secondary and Multi-purpose Education.

The Higher Secondary School is the latest type of institution covering a course of education for a period of three years and in some cases that of four years, depending upon the period of nature and course of the study. The Higher Secondary Schools have been formed by the addition of one year which is taken from the Intermediate stage of the University.

Under memo. no. 11/54-05/58-F-1451, dated the 8th May 1958, the State Government accepted the recommendations of the Secondary Education Commission including the conversion of high schools into Higher Secondary Schools for the introduction of diversified courses in such schools. The Government selected 25 and 22 non-Government high schools for conversion into Multi-purpose Higher Secondary and Higher Secondary Schools respectively. There is a difference between a Higher Secondary School and a Multi-purpose School. In a Multi-purpose School diversified courses are followed and different crafts are taught. The idea is to make it a craft-centred school which a Higher Secondary School is not. The State Government insists on some conditions on the fulfilment of which non-Government Higher Secondary and Multi-purpose Schools will be granted recognition. These conditions refer to the financial condition, strength of the pupils, the area served, management and control, etc.

The following schools have been recognised by the Government as Higher and Multi-purpose Schools from 1959 to 1962:—

- (1) Abhoya Sundari Girls' Multi-purpose School (Dhanbad),
- (2) Government Girls' Multi-purpose School (Dhanbad),
- (3) Dhanbad Multi-purpose School (Dhanbad),
- (4) J. K. R. R. Multi-purpose School (Chirkunda),
- (5) Dhanbad Academy Higher Secondary School (Dhanbad),
- (6) D. A. V. Higher Secondary School (Dhanbad),
- (7) G. N. N. Higher Secondary School (Katras),
- (8) Azad Hind Higher Secondary School (Gomoh).

HISTORY OF SOME OF THE IMPORTANT INSTITUTIONS.

Pandra High School.

This school is situated at village Pandra, police-station Nirsa. Established in 1866, it is one of the oldest schools in Bihar. Rani Hingan Kumari had established this school at Pandra, with 64 pupils. The liberality and public spirit of Rani Hingan Kumari in establishing the school at a time when the incidence of education was rather low cannot be too adequately praised.

It has at present (1962) about 900 students and 25 teachers. The school has its own building and a good library. It has also National Cadet Corps and Auxiliary Cadet Corps for the students.

Jharia Raj School.

This school situated at Jharia is the second oldest higher class institution in the district.

Prior to 1900 it was a middle school. On 1st August 1902, it was upgraded to High English School. In 1962, there were 810 students and 22 teachers. It has also N.C.C. and A.C.C. Units.

Gobindpur High English School.

This school was started in 1954 in Gobindpur. In 1962 it had 754 students and 20 teachers.

Abhoya Sundari Girls' Multi-purpose School.

The school bears the name of the wife of late Rai Bahadur H. P. Banerjee who had donated Rs. 20,000 for its construction. In 1939, it was raised to a high school with 350 students on the roll. In 1962 there are 1,300 students and 36 teachers. It has A. C. C. Units. The school was converted into a Multi-purpose Higher Secondary School in 1962. It is a progressive school.

Khalsa High School, Dhanbad.

This school was started in 1952 as a lower primary school. In 1955 it was upgraded to the status of a middle school and subsequently in 1959 it was upgraded to the status of a high school. A few years back only Sikhs and Punjabi students were admitted but during 1959 it was thrown open to all. It has 612 students and 13 teachers in 1962.

Gujerati School.

This school, essentially meant for Gujarati boys, was established in 1945. Formerly it was upper primary school and since 1958 it was raised to class VIII. It will be raised up to class XI. In 1962 it had 250 students and 14 teachers. The school is maintained by the Gujaratis in the district. The medium of instruction up to class V is Gujarati and from classes VI to VIII the medium of instruction is Hindi. It is purely a private-managed school and is not affiliated to any Secondary Board or University. After passing class VIII, the students get themselves admitted in D. A. V. School, Dhanbad or any other high school.

Mount Carmel School.

Established in 1954 at Digwadih, this school is conducted by the Sisters of Aspostolic Carmel and is meant for girls of all classes and creeds. In 1956, a school of middle standard was started at Dhanbad. After completion, the students of Mount Carmel School, Dhanbad, are sent to Digwadih School for further studies.

The institution does not receive any financial aid from Central or State Government. It prepares the children for the Matriculation Examination of Bihar Secondary School Examination Board but the medium of instruction is English.

The total strength of students of both the schools at Dhanbad and Digwadih is 680 and there are forty sisters on the staff. This is a very progressive institution in the district.

Girls' Education.

The incidence of girls' education in Dhanbad district is not very high. This will be apparent if we look into the figures of exclusive schools for the girls both at the lowest level (primary education) and at the top (college education). Co-education has come in but it cannot be said that this has become very popular. There is only one exclusive Women's College for girls in the district which is located in Dhanbad. There are some girls studying in the Jharia College also.

In 1912, there were nine primary schools for girls in the district. Most of them were aided and one was run by the Santhal Mission at Pokharia in Tundi P.-S. This school was established in 1888 by Rev. Campbell. In 1916-17 the number of primary schools rose up to 12 and in 1926-27 the number increased by only one. In 1941-42 there were three middle schools and 17 primary schools under different managements in the district. In 1946-47 the number was increased to 23. In 1951-52 there were one unrecognised high school, five middle schools and 21 primary schools in the district.

The First Five-Year Plan underlined the importance of female education. The Basic Training Schools also provided training for the ladies. In 1951-52 there were five middle schools for girls with 816 students and 26 teachers. The number of primary schools in 1951-52 was 21 with 941 students and 32 teachers. In 1955-56 one high school was added with 495 students while the number of middle schools was 6 with 1,195 students and 31 teachers. There were 38 primary schools with 1,733 students and 163 teachers. The last phase of the progress of female education from 1956-57 to 1961-62 has been discussed in the section under General Education.

This is rather a poor progress of girls' education. It may, however, be noted that Dhanbad being a highly industrialised district, there are many who come to earn their livelihood and do not bring their womenfolk or children.

LIBRARIES.

The number of libraries and the incidence of readership gives a clue to the cultural development of a district. Judged from this point of view Dhanbad district cannot be said to have a brilliant record. One of the reasons for this may be that the district is full of active businessmen, merchants, industrialists and their employees who have little time to patronise libraries.

The oldest library in the district appears to be the Lindsay Library started in 1920 as a part of Lindsay Club, a social and cultural organisation in Dhanbad. The Club was sponsored by the

elite of the town and has been maintained by the non-officials mainly with great enthusiasm and this speaks highly of the many persons who had been associated with it during the last four decades. Now the library has got 500 members and the daily readership is about 200. The library has about 20,000 books. The institution has done a great service to the people of Dhanbad town. Some of the other libraries with much smaller scope are—Saraswati Library (Jharia), Aryakumar Library (Jharia), Muslim Library (Jharia), Evening Club (Jharia), Coalfield Hindusthani Library (Jharia), Indian Institute (Katras), Bharatiya Club (Jharia) and Marwari Library (Chirkunda). The readership at these institutions is very small and they are poorly equipped.

The State has now taken up aiding the libraries and there is a danger of mushroom libraries, more or less, proprietary in nature sprouting up which do little service to the people. There are a number of smaller libraries distributed throughout the district but none of them is well equipped. The official figure in 1961 is 107 libraries in the district out of which 81 libraries received grants from the State Government. This estimate does not include the libraries maintained by the various industrial concerns throughout the district for the benefit of their employees. Some of the social clubs like Dhanbad Club, etc., Kumardhubi Club, etc., also have their own libraries. The schools and colleges have also their own libraries but very few of them are properly equipped. The State Government have started recently a library in the premises of the townhall at Dhanbad and the daily attendance of the readers is smaller than what was found at Lindsay Club. It cannot be said that this district has made any substantial contribution to the library movement.

An investigation was made and it was found that literature of light type like novels, dramas, illustrated magazines, etc., has a larger patronage. Newspapers in English and in Vernaculars are in greater demand in the urban areas than in the villages.

Journalism.

The following weeklies are now published from Dhanbad:—*New Sketch* (English), *Coalfield Times* (English), *Awaz* (Hindi), *Yugantar* (Hindi), *Kisan Mazdoor* (Hindi), *Janmat* (Hindi), *Rotarian Bulletin* (English).

The two weeklies, *New Sketch* and *Coalfield Times* are mostly devoted to the problems of collieries and colliery news. These two papers have a good circulation. There used to be a weekly paper *Sketch* in Dhanbad some years before.

LIBRARY AND OTHER CULTURAL ASSOCIATION.

Dhanbad has not made much headway by the way of well patronised and active literary and cultural associations. There are very few of such associations at Dhanbad and Sindri for the encouragement of Hindi and Bengali literature.

There is one *Basanti Vidya Nidhi* located in the premises of Abhoya Sundari Multi-purpose High School at Dhanbad which provides training in music, painting and embroidery. There is another Music School at Sindri which gives similar training. Both these institutions have been very recently started and have yet to make a headway.

It is peculiar that although Dhanbad is industrially so well advanced and has a large number of rich industrialists and businessmen, there should be so very little progress in this aspect. Institutions like Rotary Club and Lions Club have a very limited membership and they are doing useful work. But there are very few cultural institutions for the common man and this is in great contrast to what is found in another industrial city namely Jamshedpur.

COLLEGES.

Patna University had jurisdiction over all the colleges of the State of Bihar before the formation of the Bihar University. Patna University was an affiliating University. Even before the formation of the Bihar Secondary School Examination Board, Patna University used to conduct the Matriculation Examination. But since the number of schools and colleges increased, the Bihar Secondary School Examination Board was constituted in 1951 with the responsibility of conducting Matriculation Examination. Later on the work of Patna University was bifurcated between two Universities, viz., Patna and Bihar Universities in 1951. Patna University was given its jurisdiction over the colleges within a radius of five miles round about Patna City and became a sort of a residential-cum-teaching University. Bihar University had its headquarters at Patna and was mainly created as an affiliating University and had jurisdiction over all the colleges of the State of Bihar excepting that of Patna. Later on in 1960 two more Universities were created by the State, namely, Ranchi University with its jurisdiction over the whole of Chotanagpur Division and the Bhagalpur University with jurisdiction over the whole of Bhagalpur Division. The headquarters of Bihar University was shifted to Muzaffarpur in 1960.

In 1962, there are four colleges in the district excluding the technical colleges. All the colleges were affiliated to Bihar University but since 1960 the colleges are affiliated to Ranchi University with headquarters at Ranchi.

Raja Shiva Prasad College, Jharia.

Raja Shiva Prasad College is situated at Jharia.

The college was founded in July 1952 by Raja Kali Prasad Singh in the name of his father Late Raja Shiva Prasad Singh, who created a Trust for the running of the institution. The college properties comprised of land, buildings and collieries donated by him and vested in a Trust. The college was granted affiliation by the old Patna University in 1951 in the faculty of Arts. At the time of the creation of Dhanbad district this was the only college in the district.

Now this college is imparting education up to Degree standard in the faculty of Arts, Science and Commerce. Honours teaching had also been started in English since 1961-62.

Three Years' Degree Course was introduced in the college in 1959-60.

The college has its own land and building worth Rs. 7 lakhs. The college library has about 9,000 books. The college has various societies for extra-curricular and sporting activities. A college magazine is also published.

There are two platoons of National Cadet Corps each platoon consists of 60 cadets and two officers. At present (1962), 1,100 students including girls are studying in the college. A special feature of the college is that Scheduled Caste and Scheduled Tribe students account for about 20 per cent of the total students.

There are 35 members on the teaching staff.

R. S. More College, Govindpur.

The college was started in 1959 by Shri Mahabir Mahto of Govindpur with the liberal donation of Ram Sahai Mul More, a rich merchant of Calcutta. It was started in the Govindpur H. E. School building. It is affiliated up to B. A. standard to Ranchi University. At present (1962), the total numerical strength of the students is 200 and there are nine lecturers. A Senior Division N.C.C. unit has been started.

Lakshmi Narain Trust Women's College.

On August 19, 1955, a Women's College was started with the initiative of a number of enthusiasts including Shri Hirendra Nath Chatterjee, the present Secretary and Shri Saran Singh, I.A.S., the then Deputy Commissioner of the district. The college first started to function in Abhoya Sundri Girls' High School. Now the college has a separate building.

In 1959, through the munificence of Shri Shri Lakshmi Narain Trust, the college could have its own building purchased at a cost of one lakh forty-two thousand from Messrs. Turner Morrison of Lodna Colliery, Lodna. The college was granted affiliation by Bihar University in 1960, later on approved by Government of Bihar in April, 1961. The requisite sum (Rs. 50,000) for affiliation was also donated by Shri Shri Lakshmi Narain Trust. The college was renamed Shri Lakshmi Narain Trust Women's College in 1959 in recognition of the help of the said Trust.

The college has been raised to B.A. standard from July, 1957. The college is now affiliated to Ranchi University. In 1962 it has 270 students and 12 lecturers.

P. K. Rai Memorial College, Dhanbad.

P. K. Rai Memorial College was first started in 1950 at Katras by late Sri B. K. Rai, a colliery proprietor to perpetuate the memory of his father the late Sri P. K. Rai but after two years of its function

the college was wound up in 1952. Later on in 1960 the sons and relatives of Shri B. K. Rai formed a Trust, viz., P. K. Rai Memorial Trust with Shri S. C. Banerjee, Advocate as its Chairman and the college which had started at Katras was shifted to Dhanbad in 1960. It was first started as an Intermediate College. It remained an Intermediate College till 1960 and in 1961 the college was raised to the status of a degree college and Pre-University Science and Pre-University Commerce classes were also started. In 1961-62 it had 581 students and 15 lecturers including Science and Commerce.

BASIC EDUCATION.

The object of Basic education system at the elementary stage is to impart education through socially useful production activities like spinning, weaving and gardening, carpentry, leather work, book craft, domestic craft, pottery, elementary engineering, etc. It was introduced in the district in 1948 and a Basic school was started at Pindrajora.

The Basic institutions are controlled by the District Education Officer, whereas the Deputy Superintendent of Basic Education supervises the Basic institutions and is the Technical Adviser to the District Education Officer.

With the advent of an implementation of the Expansion Improver ent Programme Scheme in 1953-54 some traditional schools were also converted into Basic institutions and some new Basic schools were also started. It is difficult to get the proper type of teachers for such schools and most of the scholars are attracted by the stipends and have not made any remarkable contribution to the progress of the district. The students generally go to high schools for further education. The financial drain on the State exchequer for continuing this system of education has been very considerable and many eminent educationists and public men have recently expressed their diffidence in the way Basic education is being imparted.

The following table will show the expansion of Basic education institutions which includes Senior Basic and Junior Basic schools in this district:—

Year.	No. of schools.		No. of scholars.		No. of teachers.	
	Junior Basic.	Senior Basic.	Junior Basic.	Senior Basic.	Junior Basic.	Senior Basic.
1	2	3	4	5	6	7
1956-57	55	22	2,592	3,061	105	138
1957-58	71	24	3,481	3,231	130	142
1958-59	70	28	5,170	4,665	152	169
1959-60	74	29	5,744	5,270	174	190
1960-61	73	32	5,739	5,865	168	206
1961-62	73	34	5,931	6,466	177	215

PROFESSIONAL EDUCATION.

Teachers' Training Schools form an important wing under professional education. There is a dearth of trained teachers.

In 1950-51 a reorientation of the system of teachers' education was found necessary and the courses were modified so as to bring them nearer to the Basic system of education. The elementary Training Schools were re-named as Junior Basic Training Schools.

The training period of the Junior Basic Training School at Govindpur was extended to one to two years. In addition to the above a Senior Basic Training School had been started at Pindrajora. Candidates with the minimum qualification of a pass in the middle standard were admitted in Junior Schools while matriculates were admitted in the Senior Basic Training Schools. In 1961 the distinction between the Senior and Junior Training Schools was removed. All the schools were named as Teachers' Training Schools.

The following table will show the progress of professional schools in the district:—

Year.		No. of schools.	No. of scholars.	No. of teachers.
1958	.. ..	25	1,256	47
1959	.. ..	24	1,701	88
1960	.. ..	20	2,092	83
1961	.. ..	10	2,072	101
1962	.. ..	11	1,876	77

TECHNICAL EDUCATION.

Indian School of Mines (Dhanbad).

The Indian School of Mines, as it was originally called, was established in 1926 by Lord Irwin, Viceroy of India, as a high grade institution for training Mining Engineers as well as Geologists who may be required for the mining and mineral industries of this country. Arrangements for geological education had, however, been made in some of the Universities from 1890 onwards. The Calcutta and Madras Universities were awarding Degrees in the Geology from the early years of the present century and the standard of geological education was improved from 1910 or soon after, by the supply, to the Universities of trained Geologists from the Geological Survey of India as part-time or full-time Professors. Two or three of the important engineering institutions of the country had also the advantage of getting lecturers from the Geological Survey of India, i.e., Roorkee and Poona.

The venue selected for the establishment of the School of Mines was Dhanbad in view of the fact that it was the centre of the coal industry in eastern India, which produce over 75 per cent of the country's coal. Perhaps another reason was that the first Principal was drawn from the Chief Inspectorate of Mines which is also situated at Dhanbad and which made it easy for the Principal to keep in touch with his parent department even while carrying on the responsibilities of administering the school. Both in the name and in the nature of the syllabus and training adopted this institution has followed the Royal School of Mines, London. The original estimate for buildings, workshop, staff quarters, etc., was Rs. 22 lakhs but important and very expensive additions have been made. In November, 1926, the first batch of students had been admitted. The school was administered by a Governing Body whose President, *ex-officio*, was the Director of the Geological Survey of India. The first President of the Governing Council was Dr. E. H. Pascoe, while the first Principal of the school was Dr. D. Penman, who later became the Chief Inspector of Mines.

The school admitted originally about 25 students per year, the majority of whom chose Mining Engineering. The course extended over four years, the educational requirement for entrance being the Intermediate in Science examination of the Indian Universities. During the first two years the students study mostly common subjects, viz., Engineering, Elementary Geology and Elementary Mining, Mathematics, Physics and Chemistry. The third and fourth years are devoted to specialisation in Geology or Mining. General instruction is given in different branches of engineering, viz., Civil, Mechanical and Electrical as well as in various branches of Geology and in Principles and Practices of Mining both in coal-mines and non-coal-mines. As an adjunct to these courses there are also supporting courses in Mathematics, Physics and Chemistry so that the students' knowledge of these subjects may be up to the standard required for studying Geology and Mining. In addition, there is also a Department of languages which teaches English, German and French. For several years in the beginning the students were allowed to take the "certificate" of the school after three years' study as that was considered sufficient for mining engineers to become Managers of Mines, after the necessary practical experience in the mines. There was also the Diploma of Associateship which was given after four years' study and examination. In 1945, the Government of India appointed a Committee to go into the question of reorganisation of the School of Mines. As a result of the report of that Committee, the number of admissions to the school was increased to 48 students per year. Certain important changes were made in the curricular of the institution and the three years' "Certificate" was abolished. The Governing Body was converted into an Advisory Committee while a small Executive Committee was formed for looking after the more immediate

problems of general administration. The name of the school has now been changed to Indian School of Mines. Since 1957 the Governing Body and the Executive Committee have been replaced by a Governing Council and the Secretary of the Ministry of Scientific Research and Cultural Affairs, New Delhi, is the Chairman of the Committee.

The institution was affiliated to Bihar University in its faculties of Mining, Engineering and Applied Geology from 1954-55 session. But with the reorganisation of Universities in Bihar, the institution has been affiliated to the newly-formed University of Ranchi with effect from July, 1960.

The Associates of this institution now earn the B.Sc. degree with honours in Mining Engineering, B.Sc. (Hons.) in Petroleum Technology and M.Sc. in Applied Geology and Applied Geophysics. Regulation regarding the post-graduate courses in all the four branches of study at this institution are at present under the consideration of the Ranchi University. It may be mentioned in this connection that the first batch of 26 graduates in Petroleum Technology (Production Engineering) and the first batch of seven graduates in Applied Geophysics have come out in 1961.

The Associates of this institution are offered the benefits of Post-Graduate Practical Training Stipend Scheme of the Ministry of Scientific Research and Cultural Affairs. With effect from December, 1961, Prof. R. T. Desmukh, formerly Professor of Practical Training of this Institution, has now been put in charge of a separate Directorate of Practical Training which will look after the placement training and supervision of graduates of Mining Engineering from all over India. All such students are being paid a monthly allowance of Rs. 150 per month after graduation for practical training in mines.

The following statement will give the courses and student population of 1961-62:—

		First year.	Second year.	Third year.	Fourth year.
1. Mining Engineering	..	93	89	86	94
2. Applied Geology	..	22	20	16	11
3. Applied Geophysics	..	18	8	13	13
4. Petroleum Technology (Production Engineering).		20	22	20	20
TOTAL	..	..	..	..	565

The following statistics will show the number of candidates graduated from Indian School of Mines, from 1921-1961:-

	Mining.			Geology.			Petro- leum Techno- logy.	Geo- phy- sics.	Total.
	With certificate in—		With Diploma in M.E.3	With Certifi- cate in Geology.	With Diploma in Geo- logy.				
	C.M.1	M.M.2							
						1				2	3	4	5	6	7	8	9
		5	2	—	1	..	..	..	8
		12	4	17	1	9	..	..	43
		7	2	17	..	4	..	..	30
		2	..	15	..	5	..	..	22
		1	..	8	..	1	..	..	10
		2	1	10	..	3	..	..	16
		4	1	0	1	1	..	..	13
		1	..	5	..	2	..	..	8
		2	..	9	..	3	..	..	14
		1	1	11	..	2	..	..	15
		1	..	13	..	2	..	..	16
		6	..	17	1	2	..	..	25
		1	..	19	..	2	..	..	22
		..	..	23	..	..	..	..	23
		2	..	16	..	1	..	..	19
		..	..	22	..	1	..	..	23
1945	..	..	..	18	..	3	..	..	21
1946	..	..	..	19	..	1	..	..	20
1947	..	..	..	25	..	..	..	..	25
1948	..	..	..	24	..	..	..	..	25
1949	1	..	..	38	..	2	..	..	41
1950	1	..	..	25	..	3	..	..	28
1951	..	..	..	43	..	4	..	..	47
1952	..	..	..	33	..	0	..	..	42
1953	..	..	..	44	..	7	..	..	51
1954	..	..	..	36	..	5	..	..	41
1955	..	..	..	38	..	8	..	..	46
1956	..	..	..	38	..	6	..	..	44
1957	..	..	..	43	..	8	..	..	51
1958	..	..	..	47	..	8	..	..	55
1959	..	..	..	91	..	21	..	..	112
1960	..	..	..	87	..	9	26	7	129
TOTAL	..	..	..	..	..	..	..	..	1,085

1. C.M.—Coal Mining. 2. M.M.—Metal Mining. 3. M.E.—Mining Engineering.

The Bihar Institute of Technology, Sindri.

Prior to the establishment of this Institute, there was only one Engineering College in this State which provided facilities for training in Civil Engineering only. To fill up the needs of the trained personnel for running the new industries, one Mechanical and Electrical Engineering College at Sindri was set up from 1949 which in 1950 was renamed as Bihar Institute of Technology. A batch of 24 students (12 in Mechanical and 12 in Electrical Engineering) was admitted in Bihar College of Engineering, Patna, during 1949 because of want of buildings, laboratories, etc., at the newly started college at Sindri. Those students were later on transferred to this college in 1953 in the 3rd year class. 60 students were admitted to the 1st year class during 1950. The strength of the college went on increasing and the total students on roll during 1957 was about 600.

The Institute has its own building and is situated over an area of 800 acres having residential accommodation for all students and staff. Library, Principal's Office, Drawing Section, N. C. C. Unit and Science Laboratories are located in the main Administrative Block of the Institute. Engineering Laboratories and Workshop are located in other special buildings. The Institute has its own water-supply and electrical supply units of Government located within its compound.

The Institute seeks to impart instruction on modern lines with the aid of technical films and strips to illustrate modern practices apart from regular teaching and workshop practices. The college library is equipped with a good number of books on various subjects. A large number of extra-curricular activities associated with various phases of academic life, such as Athletic Club, Film Club, etc., have been organised.

Till 1961-62 it provided training facilities in the following branches of Engineering and Science:—

Four-Year Degree Course.

- (a) Mechanical Engineering.
- (b) Electrical Engineering.
- (c) Production Engineering.
- (d) Metallurgical Engineering.
- (e) Chemical Engineering.
- (f) Tele-communication.
- (g) Civil Engineering.

The total intake of students in the 1st year class per annum is 316. The State Government have introduced a five-year integrated course at this Institute with effect from 1962-63 in all the above branches. Since no residential accommodation for these students are available at present, only 100 students have been admitted during

1962-63 into the 1st year class of the five-year integrated course, in addition to 316 students admitted into the 2nd year class of this course. The total strength of the students on roll is 1,450 in 1962-63 and 124 lecturers.

Formerly this Institute was providing facilities for Diploma course in Mechanical and Electrical Engineering and training courses under various trades. These facilities were transferred to Dhanbad Polytechnic and the Technical Institute at Bhuli, Dhanbad, respectively.*

The Institute was affiliated to the Bihar University up to 1960, but since 1961 the Institute is affiliated to Ranchi University which is responsible for conducting examination and awarding B.Sc. Engineering degree.

Reorganised Mining Class, Bhaga.

The Mining Classes at Bhaga is the oldest Mining Institution in India. The nucleus of this institution was formed in 1906 when the Government of Bengal, Bihar and Orissa appointed a Mining Lecturer and an Assistant Mining Lecturer who used to hold classes on practical coal-mining at four centres, two in Jharia and the other two in Raniganj Coalfields, once a week.

Rooms offered by the mining industry were utilised as class rooms for the purpose at the various centres.

Early in 1921 these classes were reorganised, four halls were constructed at the following centres:—(1) Bhaga, (2) Sijua for Jharia Coalfields, (3) Raniganj and (4) Sitarampur for Raniganj Coalfields.

A Mining Lecturer and two Assistant Mining Lecturers were appointed for each coalfield. The courses covered a period of three years for each class, the classes being held two evenings per week. The syllabus then prepared was with the object of training apprentices up to the standard of Second Class Colliery Managers' Examination.

The Indian School of Mines was started from 1926 and the ex-students of that institution started appearing at the Mine Managers' Examination from 1932 onward.

It may be noted in this connection that students of the Evening Mining Classes have to appear at the same examination (Colliery Managers' Certificate of Competency) along with the graduates from the Banaras Hindu University and Associates of Indian School of Mines. The type of training given in these two places were of a much higher standard than the best training that can be imparted at the Evening Mining Class. Mining Education Advisory Board after due deliberations forwarded a scheme of reorganisation of the Evening Mining Classes both in West Bengal and Bihar in the year 1946. In 1955, the State Government of Bihar accepted the scheme

* This institution has since been shifted to its own building in Dhanbad.

forwarded by the Mining Education Advisory Board. This scheme was given effect to in August, 1956, when instead of classes on two evenings for each year in the Reorganised Mining Class two full day classes were arranged for each year. Later on two other Mining Schools were opened—one at Kodarma and the other at Maithon (Dhanbad) in 1958. The syllabus followed in those two institutions was the same as was being followed at the Reorganised Mining Class, Bhaga.

The State Board of Technical Education, Bihar, at its meeting held in May, 1960, approved a syllabus to be followed at the three Mining Institutions. Instead of a three-year course the State Board recommended that the course of training at Bhaga ought to be of four years' duration. So the new students enrolled in 1960 were for the four years' course. It will be interesting to note that although students at this institution have to attend classes only two days every week, they have very creditably competed at the Mine Managers' Examination, conducted by the Department of Mines, Government of India.

This institution has also been contributing quite a large proportion of Mine Managers and up till now not less than one-third of the total number of successful candidates are products of the Bhaga Mining School. There are ten lecturers in the Institution.

Progress during the Second Plan period (yearwise).

Year.			New students enrolled.	No. passed in Diploma examination.	No. passed in Managers' examination.	
					II Class.	I Class.
1956-57	..	..	55	Not available	32	6
1957-58	..	..	60	Ditto	35	10
1958-59	..	..	75	20	45	12
1959-60	..	..	77	60	84	20
1960-61	..	..	86	Not available	17	3

Dhanbad Polytechnic.—The present institute known as Dhanbad Polytechnic has its origin in 1954. It was first started in the premises of Bihar Institute of Technology, Sindri, with 120 students in total, 30 in Mechanical, 30 in Electrical and 60 in Civil Engineering Diploma Course. Due to lack of accommodation the course was abolished in Sindri and was shifted to Maithon in 1958 and in 1960 to Dhanbad. The present strength of the institution is nearly 700 students in all its three classes and 20 lecturers.

The institution has Diploma Course in Civil, Mechanical and Electrical Engineering of three years' duration. It has 120 students in Civil, 60 in Mechanical and 60 in Electrical classes. After the completion of three years' course the students are permitted to appear for examination conducted by the State Board of Technical Education for Diploma in Civil, Electrical and Mechanical Engineering. Hostel accommodation has been provided for 50 per cent of the students.

The minimum qualification for admission is matriculate with Physics, Chemistry, Elementary Mathematics and Advance Mathematics. The minimum age-limit in all cases is 15 years and the maximum is 21 years on the 1st July of the year of admission.

Central Fuel Research Institute

Started in 1947 in the premises of Indian School of Mines at Dhanbad it was shifted to Digwadih on the 22nd April, 1950. It is one of the eleven national research laboratories set up by the Government of India in different parts of the country. It is situated half way between Jharia and Sindri, ten miles south of Dhanbad. It conducts researches into the major problem of fuel, solid and liquid gases and conducts physical and chemical survey with the object of providing a reliable assessment of the quality and the quantity of the resources of different types of coals in the country and ensuring that they are utilised to the best advantage.

The Institute also conducts research on petroleum. The Coal Survey Organisation of the Institute covers all the major coalfields and production areas of coal. Aid has been rendered to various organisations including the National Coal Development Corporation, Indian Bureau of Mines, and Geological Survey of India by analysing thousands of samples of coal obtained from boreholes in the course of prospecting for the development of new coal-bearing regions.

Studies on the preparation of fine and small coal by autogenous cyclones using only water as medium have been undertaken on a laboratory scale and pilot plant trials are projected. On the basis of tests already carried out, the widespread use of such plants in the future can safely be predicted to the case of coal which have to be crushed prior to beneficiation.

QUALITY SURVEY.

The first and foremost necessity is to have an accurate data on the quality of the resources. These are being collected by the Coal Survey Organisation of the Central Fuel Research Institute. The activities of this organisation have been stepped up considerably with the increase in the requirement of coal in the country.

Planning for utilisation and upgrading can only be based on thorough and accurate data of the natural resources. The resources

of coking coals are located only in the West Bengal and Bihar regions, although technologically it is possible to blend certain types of coals occurring in other areas with coking coals of Bengal and Bihar for the production of metallurgical coke. The fact that the resources of iron and other metalliferous ores also occur largely in the neighbourhood of coking coals lays down an inevitable pattern of industrial development in the coking coal-iron ore belt.

The resources of other qualities of coal (including lignites) which are largely of inferior variety, i.e., high in ash and moisture, are, however, fairly widely distributed not only in the West Bengal and Bihar regions, but also in Orissa, Madhya Pradesh, Bombay Andhra Pradesh, Jammu and Kashmir, Assam and South India.

The task of research and technology, therefore, is chiefly to devise ways and means to utilise the inferior varieties of fuels—coking and non-coking coal and also lignite—in order to produce energy, gas, chemicals, as well as coke at the lowest possible cost.

AID TO INDUSTRY.

(a) Washing of Bokaro and Kargali coals.

About 60 tons (40 tons Bokaro and 20 tons Kargali) of steam coals, obtained from M/s. Hindustan Steel, Ltd., were studied, for finding out washability characteristics in the heavy medicine drum pilot coal washer (1 ton/hr. using baryte as the medium 1 sp. gr. cut at 1.52). Suitable for metallurgical purposes, the blend comprised of cleaned steam and slack coals in the proportion 44 : 56. The cleaned slack (13.4 per cent ash) crushed to $\frac{1}{4}$ " in size was obtained by washing.

(b) High Temperature Carbonization Pilot Plant Studies.

Blends to suit the Coke Ovens of the West Bengal Government's Durgapur Project were tried in the pilot coke ovens of the Institute with coals from Jharia and Raniganj coalfields. Washed Kargali seam coals blended with Jharia coals were carbonised in the H.T.C. Pilot ovens at Central Fuel Research Institute in order to find suitable blends for obtaining metallurgical coke for the Rourkela and Bhilai Steel Projects.

(c) Natural Gas from Jwalamukhi.

The sample of gas from the wells struck at Jwalamukhi by Oil and Natural Gas Commission was analysed for them at the Institute to apprise its characteristics.

(d) Dugda Washery.

Qualitative survey of the coal resources in the western region of the Jharia coalfield suggested the setting up of a Central Washery at Dugda (capacity 600 tons/hr.) for washing coals from 26 different collieries working 15 seams.

Besides the technical aid rendered to the abovementioned parties, assistance has also been accorded to the Central and State Governments and their various committees and quasi-Government organisations on various aspects of fuel and its requirements for the programmes of industrial development and expansion.

CENTRAL MINING RESEARCH STATION.

The need for systematic research into many and varied problems of mining in India has increasingly been realised over the years. The enlarged activities of the industry in India and the greater use of machinery in mines called for the establishment of a centralized research unit for co-ordinating research into all the aspects of efficiency, safety and health in mines. Both the Coal Mining Committee of 1937 and the Indian Coalfields Committee of 1946 recommended the setting up of a "Coal Research Board" to initiate and direct research into coal utilisation and mining problems. A formal proposal for the establishment of a mining research station was mooted out in 1948 by the then Director of the Central Fuel Research Institute, who was then also the Acting Principal of the Indian School of Mines. The Council of Scientific and Industrial Research appointed a committee to study the scheme. Meanwhile, the Coal Board was constituted which began to take interest in the proposed Mining Research Station. The two lines of action eventually converged in 1954, when representatives of the Council of Scientific and Industrial Research and the Coal Board met in Delhi. It was agreed that the Coal Board working under the Ministry of Production would contribute to the cost of the Station provisionally on a 50 : 50 basis. The Mining Research Station, thus, came into existence towards the end of 1955. It is located $1\frac{1}{2}$ miles north of Circuit House, Dhanbad.

The Station works in close collaboration with the mining industry, the Coal Board, the Department of Mines and similar organisations; offers facilities for testing and standardization of various mining equipments and for analysis of mine dusts, mine air and gases, water samples, etc. It provides technical aid to industry in matters relating to health and by way of scientific surveys.

Researches are being carried out to begin with, in the following main divisions:—

- (1) Mining and Engineering Division.
- (2) Ventilation, Explosions and Fires Division.
- (3) Dust and Health Division.

The divisions are subdivided into five sections:—

(1) *Mining*.—The section is conducting investigations relating to specific mining problems, especially on strata control and hydraulic stowing. Theoretical and model studies on hydraulic stowing, measurement of surface subsidence due to mining, studies on strata

deformations around extraction zones, assessment of roof bolting as a support system in mines are some of the problems under investigation now.

(2) *Mine Ventilation*.—This section deals with the major ventilation problems in Indian mines including the airflow in mines, natural ventilation, air circuits and fans, auxiliary ventilation, measurement of geothermic gradient, ventilation surveys, heat and humidity in mines. Testing and calibration of air velocity measuring instruments and testing of fans are also undertaken.

(3) *Physics and Lighting*.—This section is engaged in the testing of various types of mining equipment, viz., flame safety lamps, electric hand lamps and cap lamps, safety torches, safety helmets, safety belts, etc., for mechanical strength and efficiency and also for safety for use in gassy mines; photometry and lighting efficiency tests of illumination installations, illumination survey in mines in India, electric and electronic instrumentation applied to mining X-ray diffraction analysis for the study of mineralogical aspects of mine dusts and mineral matters.

(4) *Engineering*.—The section deals with investigation and research concerned with strength and testing of materials and with machinery employed in mining. The section will be equipped with non-destructive testing instruments, ultrasonic and magnetic inspection technique.

GEOLOGY.

This section is equipped for work as petrographic and mineralogical studies on rocks, minerals and ores. Rock-cutting, grinding, ore-polishing machines, polarizing microscopes with universal stages and instruments for use in ore microscopy are available for optical work on rocks and minerals. Research in progress includes studies on microflora of Dishergarh coal seam, the petrology of coal measure strata from Jharia coalfield, the identification of mineral particles of air-borne dust in mines and the petrology of Dishergarh Coal.

Dust and Health Section.

The programme of the section envisages investigations into health hazards in the mining industry. Amongst the investigations under progress, mention may be made of the studies on the assessment of air-borne dust, size and concentration and thermal conditions in coal-mines, dust problems in the washeries, and the effect of water spraying in the production of dust.

ORIENTAL SCHOOL.

The district is very backward in Sanskrit Education. There is only one Sanskrit *tol* at Kako in Baghmara subdivision. The State Government has started a new Sanskrit High School at Dhanbad in 1961. It has 100 students and 7 teachers.

The following figures supplied by Education Department will give an idea of Sanskrit *tol* in the district:—

Year.		No. of Sanskrit <i>tol</i> .	No. of scholars	No. of teachers.
1956	.. ..	1	22	1
1957	.. ..	1	23	1
1958	.. ..	1	26	1
1959	.. ..	1	34	1
1960	.. ..	1	44	1
1961	.. ..	1	42	1

There is no *Madrassa* in the district. Urdu and Persian are taught in ordinary schools.

PHYSICAL EDUCATION.

Drills and gymnastics have been a regular feature in the schools and colleges since a long time past. Sports and outdoor games have been a regular feature in the educational institutions.

Physical training is also given in the girls' school where provisions for games are liberally encouraged. The A.C.C. and N.C.C. units, boy scouts and girl guides have been financially helped by State Government. The district has a Deputy Superintendent of Physical Education to look after the physical education programmes in the educational institutions and Physical training centres (*Akharas* and *Vyayamshalas*).

Scouts and Girl Guides.

Till 1942, there were two district associations, one under the Scout Association and the other under the Hindustan Scouts, running separately. In 1950, both the associations were amalgamated at a higher level and they merged in the district also. It is now functioning as the Bharat Scouts and Guides Association. Regular training is given and the holding of camps are encouraged. The scouts and the guides are particularly trained to serve the country and with this object their services are utilised in the *melas* and fairs for social work. The scout movement has yet to expand.

Auxiliary Cadet Corps, National Cadet Corps and National Cadet Corps Rifles.

Military training is sought to be imparted to the students under the management of the 3rd Bihar Battalion National Cadet Corps with headquarters at Ranchi. The Senior Division of N.C.C. is meant for college students while the Junior Division is meant for school students. Since 1961, a new unit, viz., N.C.C.R. has been started in

colleges. There are N.C.C. and N.C.C.R. units in R.S.P. College, Jharia and N.C.C.R. units in R.S. More College, Govindpur. In July, 1962 the total number of cadets in these colleges were 300 which show that there is still a wide scope for the progress of the movement. The N.C.C.R. unit is under the management of 13 Bihar Group N.C.C.R. with headquarters at Hazaribagh. There are A.C.C. units in several schools of the district.

The main aim of the National Cadet Corps is to develop ideas of comradeship, service and leadership in young men and women. Another aim is to provide service training to young men and women and build up a reserve of potential defence. Parades and frequent camps are held to keep the cadets in force. The movement requires further expansion.

EDUCATION FOR THE HANDICAPPED, DEAF, DUMB AND BLIND.

A school for the blind was established in 1961 at Bhuli, Dhanbad. During 1961-62 the school had four teachers and the number of students was 27. It receives financial help from the State Government, the District Board and Dhanbad Municipality. The school is now recognised up to Upper Primary Standard. There are no schools for the deaf, dumb and orthopaedically handicapped students in the district.

SOCIAL EDUCATION.

During the First Congress Ministry from 1937 a literacy campaign had been started from the Education Department. This scheme was not much of a success in spite of a large drain of money. With the resignation of the Congress Ministry there was a set-back in whatever was being done. From 1948, a comprehensive scheme has been again sponsored by the State Government to spread literacy and to make the common man's life pleasant and useful. Centres for imparting literacy and recreations, libraries and imparting general knowledge with audio-visual aids, etc., have been linked up with the Community Development Blocks throughout the State. There are youth organisations for both boys and girls. The centres are expected to hold literacy class, community recreations, music, demonstrations for village welfare work. Particular attention is expected to be paid to the women folk in the village to make them useful mothers and sisters and citizens. Most of the centres are in the school buildings or in the office of the *Gram Panchayats* or Co-operative Societies. The State Government are spending a very large sum on these centres for books, musical instruments, equipments, etc. No appraisal has, however, been made of the efficacy of the organisation or the impact on the common man. It is a common criticism that many of such centres are more of financial drain and do very little of concrete work.

The following figures will show the expansion of adult education or social education centres in the district for the last five years:—

Years.		No. of centres.	No. of enrolments.	Teachers.
1956-57	..	156	4,244	156
1957-58	..	164	4,784	164
1958-59	..	164	4,789	164
1959-60	..	160	4,956	160
1960-61	..	160	4,856	160

RETROSPECT.

Dhanbad is a new district and has grown enormously in the last three decades mainly owing to her coal industry. The development of the coal industry has pushed up other ancillary industries.

As mentioned elsewhere Dhanbad was previously a subdivision and then raised to a sub-district in the old Manbhum district. There has not been much of an educational background in the area which now forms Dhanbad district. Purulia, the headquarters of Manbhum, was the main centre for educational and cultural activities and a few local schools had been started at Pandra, Bagsuma, Chandankiary, etc., mostly by local zamindars. The richer zamindars like the Raja of Jharia or Rani of Pandra did support some of the old educational institutions but the weightage was given for the Sadar subdivision which formed the bulk of the old Manbhum district and which has now gone over to West Bengal.

It may be correct to state that Dhanbad and its neighbourhood which includes the satellite towns of Jharia, Katras, Kerkend, Bhaga, Sindri, etc., forms the most important chunk of Dhanbad district. Most of the educational institutions and particularly the technical ones are concentrated in this area. Even the industry and business interests at outlying places like Maithon and Kumardhubi have not developed much far so far as educational facilities are concerned. This is a peculiar feature of this district—a heavy concentration of the educational and cultural institutions within only a few sq. miles of the district headquarters. The reasons are not far to seek. Administrators, industrialists, businessmen, the educated and the intelligentsia, etc., are all in heavy concentration within these 10 sq. miles or so. It is true that they form an excellent cross-section of people hailing from different parts of India and this has made Dhanbad a cosmopolitan town like Jamshedpur. Dhanbad and its neighbourhood is comparatively free from the virus of casteism and there is much more of national integration and solidarity. Judged from this point of view although Dhanbad has not had a long start for education, she has an excellent record at the moment for advancement of education and culture. This will also be borne out from the fact

* The figures are supplied by the office (P. C. R. C.).

that Dhanbad stands second within the districts of Bihar so far as literates are concerned. Patna has the highest percentage of 28.7 literates, with the break up figures of 43.5 per cent for males and 13.0 for females. Dhanbad comes next with 25.5 literates with the break up figures of 37.2 per cent for males and 10.7 per cent for females. The district to come next in point of literacy is Singhbhum with 22.9 per cent of literates. Singhbhum is also an industrially advanced district. A few other figures will be of interest in this connection. Dhanbad is the smallest of all the districts in Bihar from the points of view of area and population. Her area is 1,114 sq. miles according to 1961 census and the population is now 11,58,610 as against 9,05,783 in 1951.* Twenty-five per cent of the total population live in the nineteen urban areas. The density of Dhanbad district is 1,045 per sq. mile and there are 792 females per every 1,000 males. The advancement in literacy in Dhanbad district will appear to be quite remarkable when it is remembered that the percentage of population of Scheduled Castes is 17.86 and that of Scheduled Tribes 11.08 according to 1961 census.

Dhanbad district has yet to produce literary men, poets or writers. A highly industrialised district there is naturally more emphasis on technical education but art and literature, etc., should not be neglected. The Bar, public men and the colliery. Proprietors and the highly technical supervisory staff have pioneered schools and colleges and the State Government have given liberal help. It is expected that there will be the necessary shift to cultural development. This is a highly interesting district where mutual adjustment of different strata of culture have taken place and offers a rich field for the investigation of the anthropologist and the social scientist. But within the district time must be generated the urge for a simultaneous cultural development so that the district is not steeped into the evils of all industrialism.

*Territorial additions were made in 1966 when Dhanbad was raised to a district and the Sadar subdivision of Manbhum went over to West Bengal.

CHAPTER XIII.

MEDICAL AND PUBLIC HEALTH SERVICES.

SURVEY OF PUBLIC HEALTH AND MEDICAL FACILITIES IN EARLY TIMES.

Regarding indigenous system of medicine the *District Gazetteer of Manbhum* by H. Coupland (1911) mentioned that the allopathic system of medicine and surgery had steadily gained popularity at Dhanbad and Jharia. He further mentioned that in the remote areas allopathic drugs were not commonly used, and the majority of the people consulted *Hakims* or the *Vaidyas* who practised the *Unani* or the *Ayurvedic* system of medicine respectively. The village *ojha* or the barber was also consulted and the treatment consisted in many cases of incantations, charms or the performance of *pujas* varied with the use of a few comparatively simple herbal remedies, the knowledge of which in particular diseases had been handed down from father to son. The village barber used to make incisions.

Coupland mentions that starvation and abstinence from drink were ordinarily prescribed in cases of fever. Drugs like opium, camphor, nutmeg, myrobalan, aloes, lime-juice, salt, vinegar, assafoetida, etc., used to be prescribed quite often.

The early British administration introduced the allopathic system of medicine and surgery. Hospitals and dispensaries were opened in the urban areas first and then extended to the interior. With the introduction of Local Self-Government, maintenance of dispensaries became a major duty of the District Board and a number of rural dispensaries came to be opened. There was a lot of antipathy on the part of the people to take to the modern system of allopathic treatment and it was difficult to push in an injection or to make an operation decades before. But now the craze is to get an injection for a quicker cure. There was also a certain amount of encouragement to the indigenous system of medical treatments, namely, *Kaviraji* and *Unani*. The system of Homoeopathy has more of a foothold in the urban areas since a very long time.

VITAL STATISTICS.

The system of registration of vital statistics in Bihar is regulated by the Bengal Birth and Death Registration Act of 1873. Under this Act registration of vital statistics data is compulsory both in urban and rural areas of this State. There is also a provision for a very light penalty in this Act which may extend to five rupees for neglecting in giving the information to the collecting agents of registration of statistics. But the penal section is seldom resorted to. The result is that the incidence of under-reporting is very high.

In the rural areas, as well as in some of the urban areas, the village *chaukidar* collects the data of birth and death in his area, and submits them to the thana officers on his respective parade day.

These thana officers are the Registrars of Births and Deaths for the areas under them according to the Bengal Birth and Death Registration Act of 1873. A parade day in thana is arranged so that every *chaukidar* pays a visit to the thana in the course of a week. The thana officers maintain the registers of births and deaths and compile the data obtained from the *chaukidars* and submit the statement once a month to the Medical Officer, Jharia Mines Board of Health. Every colliery submits a monthly return to the Chief Medical Officer of Health, showing the sickness, mortality, birth and death in the colliery areas. The scope of leakage is very large.

In the towns the birth and death figures are collected by the municipality and Jharia Mines Board of Health through the Health Visitors.

The Medical Officer of the Jharia Mines Board is the *ex-officio* Registrar of Births and Deaths for the whole of the mining settlement while the Sanitary Inspectors of the different circles function as Sub-Registrars of Births and Deaths for their respective circles. At places which are not the headquarters of the circle of Sanitary Inspectors, the Senior Health Overseer-cum-Vaccinator functions as the Sub-Registrar (vide Registration of Births and Deaths Act, Bengal Act IV of 1873). The Sub-Registrars also consult police records for verification of their records. The Health Overseers-cum-Vaccinators further verify the reports locally, when they tour in their areas.

The Medical Officer of Jharia Mines Board of Health sends the consolidated monthly vital statistics returns to the Director of the Bureau of Economics and Statistics. The Directorate of Economics and Statistics maintains the vital statistics of the State as a whole and submit the data to the Director General of Health Services, Government of India, New Delhi. Unfortunately, the system of collecting and reporting such vital statistics has many loopholes. There are hardly any checks. The civic sense of the public is not acute that a man should think it to be his duty to report a birth or a death. The agency's response may not be good. A pneumonia case may be recorded as fever.

The statement of vital statistics of the district excluding Chas and Chandankeary thanas from 1956 to 1961 has been given below:—

Year	Births			Deaths		
	Male	Female	Total	Male	Female	Total
1	2	3	4	5	6	7
1956..	Not available	Not available	30,813	Not available	Not available	11,768
1957..	6,324	5,899	12,223	2,422	1,869	4,291
1958..	5,795	5,306	11,101	2,489	1,861	4,350

1	2	3	4	5	6	7
1959 ..	Not available	Not available	11,056	Not available	Not available	2,628
1960 ..	4,031	3,610	7,641	1,412	1,035	2,447
1961* ..	Not available	Not available	5,293	Not available	Not available	1,010

IMPORTANT CAUSES OF MORTALITY.

According to the returns submitted year by year by far the greatest mortality is said to be due to fever, but the ignorant *chaukidar* responsible for the returns is not an expert and he is prone to return, it may be most deaths as due to fever. After fever the greatest mortality is ascribed to cholera, which breaks out almost every year and occasionally spreads over the district. Colliery and motor accidents claim a number of fatalities in this district.

The want of proper nutritious diet, proper clothing in winter are main causes of infantile deaths. The main reasons for infantile deaths are the bowel troubles, rickets, respiratory troubles, etc.

COMMON DISEASES.

The common diseases of the district are the same as one finds in the other parts of State, fevers due to common cold, influenza and respiratory diseases such as Bronchitis, Pneumonia, Dysentery, Typhoid, Tuberculosis, Leprosy and Venereal diseases. Dysentery cases are very common particularly in hot weather and also when the paddy seedlings are planted. Malnutrition and Ankylostoma infections are responsible for the high incidence of Dysentery. Cholera and Small-pox break out during the months of February and July though not always in epidemic form. Plague is not unknown. Blindness and leprosy can be listed as general infirmities amongst the people of this district though a few cases with other bodily infirmities also seen.

Cholera.

It is an endemic disease of this district. It generally breaks out during the hot weather but no particular season can be called a cholera season. The statement below will show the attacks, deaths and inoculations from 1950 to 1961. It has, however, to be mentioned that it is difficult to treat the statistics with confidence. The Medical Department could not furnish the statistics of attacks of cholera from 1923 to 1949 although they could show figures of death. The inoculation figures for these years were also not available.

* The very fact that we could not get the recent 1961 figures and some of the earlier figures will lead one to doubt if the figures could be accepted as all correct. (P. C. B. C.)

Cholera.

Year.	Attacks.	Deaths.	Inoculation.
1950	1,367	659	91,880
1951	410	233	69,574
1952	217	89	1,09,857
1953	143	51	1,18,026
1954	164	42	94,740
1955	Not available	214	80,183
1956	156	56	Not available.
1957	149	66	3,59,755
1958	155	64	6,53,027
1959	150	40	Not available.
1960	Nil	Nil	4,42,938
1961	29	16	3,86,400

Small-pox.

It seldom becomes epidemic in the district. It has been observed that it generally breaks out in the beginning of October and November and lasts till June.

Vaccination is the antidote for the prevention of the disease. The District Health Officer and the Jharia Mines Board of Health have the responsibility to carry on a ceaseless vaccination programme throughout the district. Vaccination is a statutory obligation but seldom there are prosecutions.

The table below shows the attacks and deaths from small-pox for the years 1950 to 1961. Here also the earlier figures of attack were not available although the figures of death were available:—

Year.	Attacks.	Deaths.
1950	1,843	103
1951	1,108	282
1952	670	145
1953	77	14
1954	108	34
1955	Not available	Not available.
1956	Not available	96
1957	Not available	160
1958	Not available	Not available.
1959	77	13
1960	9	Nil.
*1961	10	4

* The paucity of figures will naturally throw doubt (P. C. R. C.).

If the above figures are correct they indicate that there has been a considerable decline in the incidence of small-pox. Vaccination and revaccination could completely control small-pox. But people are still apathetic to take vaccination. It has, however, to be mentioned here that the figures of vaccination and revaccination are not correlated. No statistics are collected to show how many vaccinated persons took revaccination and how many deaths are from the section of the people that was revaccinated.

The recent statistics of vaccination and revaccination supplied by the department are given below:—

Year.		Primary vaccination.	Revaccination.
1950	..	25,760	69,330
1951	..	26,591	1,29,665
1952	..	25,617	1,41,085
1953	..	21,396	1,86,409
1954	..	21,419	1,48,412
1955	..	Not available	Not available.
1956	..	40,474	3,23,472
1957	..	26,593	1,45,938
1958	..	26,165	2,79,757
1959	..	22,465	2,36,619
1960	..	19,749	1,50,736
1961	..	22,236	2,25,767

Diarrhoea and Dysentery.

Dysentery is the most common disease in the district. Diarrhoea and other bowel complaints are not so very frequent.

The table below shows the incidence of death from 1950 to 1961:—

Years.			Deaths.
1950	..	..	208
1951	..	..	142
1952	..	..	126
1953	..	..	119
1954	..	..	133
1955	..	..	129
1956	..	..	156
1957	..	..	221
1958	..	..	171
1959	..	..	130
1960	..	..	88
1961	..	..	141

The figures fluctuate and it is a fact that figures of deaths from the mofussil are seldom correct.

Plague.

It is now an uncommon disease. Only nine cases of bubonic plague were treated in Dhanbad Civil Hospital in 1948-49, out of which three patients expired. During the same year four other cases were treated at the Chandkuiya Plague Hospital. There has been no outbreak of plague again.

Venereal Diseases.

Venereal diseases are very common in the district. It is prevalent mostly in colliery areas of the district.

The following statement of the total number of cases treated in different hospitals under the Board supplied by Jharia Mines Board of Health will give some idea about the incidence of venereal diseases in the district:—

Kind of diseases.	1956.	1957.	1958.	1959.	1960.
Gonorrhoea ..	407	284	483	356	214
Syphilis ..	196	236	318	190	140
Other venereal diseases.	93	314	546	2,073	1,079

From the above statement it appears that the figures are very fluctuating but they do indicate a high incidence. It has to be remembered that the hospitals of the Jharia Mines Board do not treat all the venereal cases that come for treatment. The Sadar hospital figures are not available.

Other Infirmities.

Blindness and leprosy can be treated as general infirmities amongst the people though a few cases of other bodily infirmities are noticed.

The incidence of blindness is not so high but the number of leprosy cases both in rural and urban areas is very high. The arrangement for their treatment has been mentioned elsewhere.

The number of leprosy cases treated in the Leprosy Hospital and Clinic of the district from 1950 to 1961 is given below:—

Leprosy.

Year.	Treated.	Cured.
1950	3,487	134
1951	3,434	105
1952	3,575	94
1953	3,236	97

Year.		Treated.	Cured.
1954	.. ..	3,413	67
1955	.. ..	2,013	90
1956	.. ..	Not available	Not available.
1957	.. ..	1,611	85
1958	.. ..	886	70
1959	.. ..	501	63
1960	.. ..	133	83
1961	.. ..	142	91

From the above statistics it becomes clear that the incidence of leprosy has come down. The disease is common in Chas, Chandankiari and Jharia areas. Many cases do not go to the hospitals.

PUBLIC HOSPITALS AND DISPENSARIES.

Hospitals and dispensaries in this district according to the line of treatment followed, may be said to be mainly of four types, viz., Allopathic, Homoeopathic, *Ayurvedic* and *Unani*. The number of Allopathic dispensaries is by far the largest. There is a *Unani* Hospital managed by the District Board and is situated at Nawadih. The oldest dispensary of the district is at Pandra opened in 1872 by Rani Hingan Kumari which is now being managed by the Dhanbad District Board.

There are altogether 46 Allopathic Hospitals and dispensaries functioning in the district, out of which 19 are run by the Government, 8 by the District Board and the rest by the Eastern Railway, Jharia Mines Board of Health, Coal Mines Welfare Commissioner, etc. The following statement gives the details:—

Number of Hospitals, Dispensaries, Primary Health Centres of Dhanbad District.

Name.	Agency of maintenance.
1. Katras Regional Hospital	Coal Mines Welfare Commissioner.
2. Tisra Regional Hospital	
3. Eastern Railway Hospital, Dhanbad and Health Unit.	Eastern Railway.
4. Eastern Railway Hospital, Gomoh.	
5. South-Eastern Railway Hospital, Bhaga.	South-Eastern Railway.
6. Mudidih Hospital (Private)	Messrs. Bird and Co.
7. Loyabad Hospital (Private)	
8. Kumardhubi Hospital (57 beds) (Private).	

Name.	Agency of maintenance.
9. Kustore Hospital (Private)	Raniganj Coal Association.
10. Jamadoba Hospital (Private)	Tata Iron and Steel Co.
11. Leena Macrae Hospital, Bhowrah (Private).	Eastern India Coal Co.
12. Nararee Hospital (Private)	Eastern India Coal Co.
13. Maithon Hospital (Private)	Damodar Valley Corporation.
14. Chandkuiya Infectious Hospital (30 beds) (Private).	Jharia Mines Board of Health.
15. Police Hospital, Dhanbad	State Government.
16. B.M.P. Hospital, Govindpur	State Government.
17. Sadar Hospital, Dhanbad (121 beds).	State Government
18. Sindri Hospital ..	Sindri Fertilizer Corporation, India, Limited.
19. Central Hospital, Dhanbad (250 beds).	Coal Mines Welfare Fund Organisation.
20. Balliapur Dispensary ..	} State Government.
21. Jharia Dispensary ..	
22. Kenduadih Dispensary ..	
23. Jorapokhar Dispensary ..	
24. Jogta Dispensary ..	
25. Sindri Dispensary ..	
26. Govindpur Dispensary ..	
27. Topchanchi Dispensary ..	
28. Employees' State Insurance Dispensary, Kumardhubi.	
29. Employees' State Insurance Dispensary, Mugma.	
30. Employees' State Insurance Dispensary, Dhanbad.	
31. Employees' State Insurance Dispensary, Chanch.	
32. Employees' State Insurance Dispensary, Chota Ambona.	

Name.	Agency of maintenance.
33. Nirsa Mangobinda Charitable Dispensary.	} State Government.
34. Chirkunda Dispensary ..	
35. Tundi Dispensary ..	
36. Rajgunj Dispensary ..	
37. Katras Dispensary ..	
38. Baghmara Dispensary ..	
39. Solukchapra Dispensary ..	
40. Chas Dispensary ..	
41. Gorh Raghunathmera Dispensary.	
42. Chandankiari Dispensary ..	
43. Nagarkiyari Dispensary ..	

There are no Nursing Homes, Public Health Research Centres and Mental Hospitals in the district.

ORGANISATION.

There are two district sections so far as the administration of the Health Department is concerned. Broadly speaking one section is the preventive side which is known as the Public Health Department and the other section is the curative side known as Medical Department. Previously there were two Directorates, one was known as the Directorate of Public Health under the Director of Public Health who had several Deputy Directors and Assistant Directors and there used to be one District Health Officer at the district headquarters. The Directorate was under the Inspector-General of Civil Hospitals and under him there was the Civil Surgeon, the principal Medical Official at the district headquarters. For quite a long time the Inspector-General of Civil Hospitals usually the seniormost Indian Medical Service Officer available in the province was also the Secretary of the Health Department who controlled both the sections as indicated. With the change of the policy of the Government, the Secretaryship was taken away from the Inspector-General of Civil Hospitals and given to an I.C.S. Officer.

With the expansion of both the departments the number of gazetted doctors had enormously increased and it was increasingly felt that there was overlapping and avoidable duplication work. It was also felt that both the departments would work better if the overall responsibility and supervision was vested in one and the same officer at the Government level and at district level also there should be one senior doctor who could be entrusted with both the preventive and curative sides. It is with this object that the public health

and the medical department was amalgamated abolishing the post of the Inspector-General of Civil Hospitals and creating a common post of the Director of Health Services for Bihar.

The shift in the policy of the State had also its impact on the district organisation. In 1959, the post of a Civil Surgeon in the district was converted to that of the Senior Executive Medical Officer-cum-Civil Surgeon. Henceforth the Senior Executive Medical Officer-cum-Civil Surgeon was to be responsible for the efficient implementation, supervision and control of all public health measures preventive as well as curative.

Duties of the Senior Executive Medical Officer.

As mentioned the Senior Executive Medical Officer is responsible for all medical work in the district both preventive and curative. He is assisted by the District Medical Officer of Health in respect of Public Health work.

He is Superintendent of all State Government hospitals and dispensaries within his district. He is responsible for the supervision and inspection of all schemes of the Medical and Public Health section in his district. He is an *ex-officio* member of the District Board Sanitation Committee and is appointed as Chairman of that Committee. The Senior Executive Medical Officer is also responsible for the enforcement of drug control measures and as such he can inspect any druggists' shop within the district. He is the authority to issue licenses for medical shops and also to cancel the same in case of non-observance of prescribed rules.

The Senior Executive Medical Officer-cum-Civil Surgeon visits the Sadar and Police Hospitals at headquarters daily when he is not out of station on duty. He is expected to inspect all the hospitals and dispensaries in charge of Medical Officer of the status of Assistant Surgeon in the district and all the hospitals at subdivisional headquarters at least twice a year.

He is expected to scrutinise the expenditure of every hospital and dispensary in his district and guide the managing body.

The multifarious duties have practically made the officer more of an administrator and an Inspecting Officer. Almost everyday he has to attend a meeting at headquarters. If he has to inspect all the institutions in the mofassil under him he will have to be touring for quite a number of days in the week. By this arrangement it may be that the public may be deprived of the skill of a good surgeon or a physician. The scheme has not worked very long to justify an appraisal. There is hardly any drug control or check on spurious doctors practising.

Duties of the District Medical Officer.

His services have been placed under the District Board and he is to give advice on the technical matters concerning Public Health.

such as control of epidemics, vaccination, sanitation, etc. He supervises the work of the subordinate public health staff, viz., Assistant Health Officers, Vaccinators, Disinfectors, who are the employees of the District Board. He seeks advice of the Senior Executive Medical Officer in every matter relating to public health and the latter is to report any case of default and management to the Government.

The Community Development Blocks have a static and mobile dispensary with three health sub-centres. The Block Medical Officers are responsible for both the preventive and curative medicines.

Mobile Health Centres.

Mobile Health Centres have been opened in eight Community Development Blocks of the Dhanbad district to serve the rural areas.

There are twenty-four Mobile Health Centres in this district. There are three Mobile Health Centres in each Block.

Each Mobile Health Centre of Community Development Block is run by one Health Worker and a trained *dai*. As a preventive measure these centres disinfect wells and houses, give cholera inoculations, vaccinations, distribute milk powder and multivitamin tablets free of cost. In each mobile centre outdoor patients are treated free of cost. The Medical Officer in charge of the Block attends the mobile centres twice a week and examines the patients and prescribes medicines.

Activities of the dispensaries of the Community Development Blocks of Dhanbad.

Each Community Development Block Dispensary consists of a Medical Officer, a Sanitary Inspector, a Lady Health Visitor, three Auxiliary Nurses or trained *dais* and an Auxiliary Health Worker.

The function of these dispensaries is to maintain a satisfactory incidence of health in the rural areas. Disinfection of wells, inoculation and vaccination are some of the preventive measures while the Block Doctor treats the patients at the Block dispensaries. There are some Blocks which are without a doctor. Some of the Block Doctors have not got the proper cut to work with missionary zeal in the rural areas. Want of private practice is a damper to the Block Doctors. Private practice for the Government hospital and dispensary doctors has been almost a problem throughout the State and there is bitter complaint that the patients at the hospitals and dispensaries are neglected by the Government doctors who care more for their private practice.

Sadar Hospital, Dhanbad.

From July, 1908, this institution known first as the Dhanbad Civil Hospital was maintained by joint management of the Manbhum District Board, the Dhanbad Municipality and Jharia Mines Board of Health. On the 15th July, 1955, it was taken over by the State

and since then it is functioning as the State Hospital. The hospital is fairly well equipped.

In the beginning, the hospital consisted of 16 beds with two infectious beds along with an outdoor dispensary. In 1962 there are 63 beds for males, 38 for females, 10 for children and 10 for T. B. patients. The hospital has now an operation theatre, an X-ray plant and a T. B. clinic. The hospital has five doctors including one lady doctor, seven nurses, five compounders and five dressers (1962).

The table below shows the number of patients treated between 1950 and 1961:—

Year.		Indoor patients.	Outdoor patients.
1950	.. ..	2,290	13,173
1951	.. ..	2,098	13,372
1952	.. ..	2,186	13,614
1953	.. ..	2,355	14,854
1954	.. ..	2,426	18,667
1955	.. ..	2,581	21,727
1956	.. ..	2,672	23,679
1957	.. ..	3,416	17,966
1958	.. ..	3,608	19,419
1959	.. ..	33,504	52,162
1960	.. ..	41,245	60,590
1961	.. ..	52,195	71,087
1962 (up to October)	.. ..	25,655	37,148

The hospital has served a useful purpose in spite of its limited scope particularly the fewer number of beds. The strength of the nurses is very poor. The hospital is located in a congested place, i.e., just opposite the Courts. There is not much space for expansion.

The Leper Hospital and Clinics.

The Leper Hospital and the Clinic are situated at Tetulmari about one and half miles away from Tetulmari Railway Station. It runs on public donations and aids from the State Government, Jharia Mines Board of Health, Dhanbad Municipality, District Relief Association, District Board and Coal Mines Welfare Organisation. The hospital was established in October, 1937 with 14 free beds and two cottages one for the paying patients, but the strength has been increased to 45 free beds and 12 paying cottages. The hospital has one Medical Officer with other staff.

There are a number of leper clinics at different places, viz., Dhanbad, Jharia, Tetulmari, Telmucho, Chirkunda, Pandra, Chas and Chandankiari. The Chief Leprosy Officer looks after these

clinics excepting the last four which are in charge of the Civil Surgeon. The incidence of leprosy is high. Purulia district which is the parent district of Dhanbad has leprosy almost all over now and the infection has apparently spread from there.

Tuberculosis.

A separate T. B. Clinic Centre with a Medical Officer was opened in 1959 at the Dhanbad Sadar Hospital. There are three Health Visitors and one compounder under the control of the Medical Officer. The main duty of the Health Visitors is to give demonstrations and lectures among the people of different wards of the municipal areas. There are ten beds for T. B. patients attached to Sadar Hospital.

The following statistics from Dhanbad T. B. Clinic Hospital are suggestive of a high incidence of this disease:—

Year.	Outdoor T. B. patients.			Indoor T. B. patients.
	Old cases.	New cases.	Total.	
1959	11,215	1,847	23,062	7
1960	17,148	3,052	20,200	8
1961	6,135	2,070	9,205	10
1962 (up to August).	18,419	2,535	20,954	6

There is scope for a sanatorium in a wooded spot. There is none now. The smog in the district is one of the main causes.

Eastern Railway Hospital, Dhanbad.

This hospital was opened in 1925 for the railway employees, their families and railway accident passengers. The District Medical Officer with a staff of 9 doctors and 20 nurses run the hospital. There are 61 beds out of which 30 are for males, 21 for females and 10 for the Maternity and Child Welfare Centres.

The Eastern Railway has smaller hospitals or dispensaries at Gomoh, Katras and Patherdih.

Central Hospital, Dhanbad.

This hospital was opened in 1951 to look after the welfare of the Central Government employees and their families. The hospital is very well equipped and has 250 beds. This is maintained by the Coal Mines Labour Welfare Fund (Central Government). There are a number of doctors including lady doctors and a fairly strong nursing staff. The details of the working of this hospital will be found in Industries chapter. This hospital, however, does not normally accept cases of persons other than colliery workers.

Kumardhubi Hospital.

This hospital was established in 1917 primarily for the employees of Kumardhubi Fireclay and Silica Works, Ltd., Eagle Re-rolling Mill, Ltd., and Engineering Works. With the expansion

of the township of Kumardhubi the hospital has also now been thrown open to the public as well.

It is a well equipped hospital with 57 beds, a Maternity and a Child Welfare Centre. There is a staff of three Medical Officers and Nurses, etc.

The table below supplied by the Chief Medical Officer shows the number of patients treated in 1962*:-

			Indoor.	Outdoor.
January	..	..	106	877
February	..	..	131	896
March	..	..	127	965
April	..	..	139	968
May	..	..	145	1,111
June	..	..	148	1,172
July	..	..	Not available. Not available.	
August	..	..	281	1,839
September	..	..	266	1,465
October	..	..	187	1,343
November	..	..	154	1,116
December	..	..	155	1,088

Jharia Mines Board of Health.

The Jharia Mining settlement has an area of 797 square miles. It consists of the whole of the Dhanbad district including the Dhanbad Municipality area but excluding a small area of about 10 square miles with 19 villages and the factory and the quarters of the Sindri Fertiliser and Chemicals, Limited, a major part of Chandankiary police-station area and the entire area of Chas police-station. The details of the Board have been given elsewhere.

The main function of the Board is to look after the sanitation and public health of its jurisdiction. The Board maintains an Infectious Diseases Hospital at Chandkuiya. There are 30 beds.

The number of patients since 1957 to 1961 is as follows:-

Year.		Cholera.	Small-pox.	Other diseases.	Total.	Patients cured and discharged.
1		2	3	4	5	6
1957	..	234	122	240	596	547
1958	..	88	261	404	753	655
1959	..	6	61	253	320	306
1960	..	Nil	80	338	418	392
1961	..	4	51	517	572	67

* Supplied by the Chief Medical Officer, Kumardhubi.

There are 33 Maternity and Child Welfare Centres which are looked after by the Jharia Mines Board of Health. These are divided into 10 circles. These centres are situated at Phularitand, Baghmara, Madhuban, Kharkhari, Katras, Chhlabad, Kankanee, Mudidihi, Keshalpur, Pootkee, South Bulliany, Katchi Bulliany, Gansadih, Jharia, Ena, Ghanoodih, Bhowra, Jamadoba, Jeetpur, Tisra, Jeena-gora, Lodna, Bhuli, East Busseria, Kusunda, Nayadih, Hirapur, Nirsa, Khas Nirsa, Mugma, Badjua, Chirkunda, Laikdihdeep and Chanch. The current annual expenditure sanctioned for the year 1961-62 is Rs. 1,52,975 including Rs. 50,000 received from the Coal Mines Welfare Fund. The Board also receives grant for training of *dais* from a State Government under UNICEF Scheme every year. There are a Maternity Supervisor, a Lady Medical Graduate with post-graduate qualifications in Maternity and Child Welfare, 10 qualified Lady Health Visitors, 6 midwives, etc., to look after the Centres.

The statement of the work of the Maternity and Child Welfare cases at the 33 Maternity and Child Welfare Centres is as follows:—

Maternity cases.		1956.	1957.	1958.	1959.	1960.	1961.
		Total atten- danco.	Total atten- danco.	Total atten- danco.	Total atten- danco.	Total atten- danco.	Total atten- danco.
		1	2	3	4	5	6
Ante-natal	..	24,396	24,722	25,117	24,922	24,416	25,931
Post-natal	..	8,501	9,632	11,492	10,983	15,080	11,302
Infants	..	22,934	24,978	28,068	25,123	31,717	25,522

Statistics supplied by the Jharia Mines Board of Health.

Family Planning Centres.

Family planning is now being implemented in India to check the population explosion. The problem has been accentuated by scarcity of food, unemployment and other kindred problems.

There are Family Planning Centres run by the Central and State Governments at Dhanbad, Jharia, Sindri, Chandankiary, Chas, Topchanchi, Govindpur, Tundi, Nirsa, Baghmara, Balliapur and Gomoh. These Family Planning Centres are attached to National Extension Blocks of their respective areas. The figures of people attending the Centres are very small. A beginning has been made but no substantial work has yet been done.

Maternity and Child Welfare Centres.

To provide better care and medical attention to mothers in both pre-natal and post-natal stages and also to the infants from their birth up to a certain age, the first Maternity and Child Welfare Centre

was opened in 1930 in Dhanbad which was functioning under the Jharia Mines Board of Health. The number of such Centres increased to twenty-eight during 1954 in nine circles under the management of Jharia Mines Board of Health. These circles are Baghmara, Katras, Kenduadih, Jharia, Bhowrah, Bhulanbarari, Tisra, Bhuli and Chirkunda. Each Centre is under a Lady Health Visitor who is assisted by trained *dais* and midwives.

These Centres serve a population over two lakhs and are extended to about 146 collieries. In 1946-47 there was an expenditure of Rs. 25,840 only on this account. This has now increased to about a lakh of which Rs. 50,000 is received as grant from the Coal Mines Welfare Organisation and Rs. 6,000 from the Victoria Memorial Scholarship Fund, Bihar, for the training of *dais*. These Centres particularly serve the colliery employees. Ordinary labour cases are conducted by *dais* and whenever any medical help is required, the case is sent to the Central Hospital or to Dhanbad State Hospital.

The State Government have sponsored one Child Welfare and Maternity Centre at Dhanbad town. It is under the supervision of the Senior Executive Medical Officer. A Lady Health Visitor, a midwife and a *dai* are posted at each Centre. This Centre is financed by the State Maternity and Child Welfare Bureau. The UNICEF also gives aid to these Centres in cash and kind such as milk, medicine, etc. The Centres also hold baby shows and distribute milk to the mothers and the children. They propagate necessary information for the well-being of the mother and the child.

SANITATION.

The Senior Executive Medical Officer and the Civil Surgeon is in overall charge of sanitation of both urban and rural areas. Rural sanitation is the responsibility of the District Board. The District Medical Officer of Health is particularly put in charge of rural sanitation. He is under the control of the Senior Executive Medical Officer and Civil Surgeon. In each subdivision there is an Assistant Medical Officer. The Sanitary Inspectors are under the Assistant Health Officer. There is one Sanitary Inspector for three thanas. Each thana has one Health Inspector and Vaccinator. On the average this unit is meant for every 30,000 population. This is extremely inadequate. There is provision for a Medical Officer in each Block of the district who is put in charge of the Health Centres. Some of the Blocks are, however, without a doctor. The Medical Officer is responsible for preventive side also. One Sanitary Inspector, three Health Workers and three *dais* are expected to be posted in each Block.

Urban Sanitation.

The municipality and the Notified Areas have the responsibility of looking after urban sanitation. The incidence of urban sanitation of Dhanbad, Jharia and Katras cannot be said to be of a very

high order. The municipality and the Jharia Mines Board of Health have their own problems of small finance, congested areas, slum pockets, small civic sense and slight popular response and habit to follow sanitary habits. The older portions of the urban areas are extremely congested. The new expansions have not always been on any plan. Sindri is an exception. Water-supply is still inadequate in most of the urban areas.

There is no underground drainage in Dhanbad town. The slum areas are scattered in the town.

Rural Sanitation.

The problem of drinking water is more acute in the rural areas. People use almost any source of water for drinking purposes. The problem becomes all the more acute during the summer season when these rivulets and tanks become dry. The Block authorities are sinking masonry wells. The Welfare Department is also working in this direction.

Sanitation in Coalfields.

Sanitation in coalfield areas was a problem before 1906 when the first Sanitary Committee was formed for the collieries with the local zamindars, Civil Surgeon, Medical Officer of Indian Mining Association and the Subdivisional Officers as members and the Deputy Commissioner of Manbhum as President. But the Committee had its limitations. In 1908 there was epidemic of cholera and the working of many collieries was brought to standstill.

The main cause of this epidemic was attributed to water scarcity. The bigger collieries spent lots of money over better water-supply and many of them introduced Jewel filter system. Housing problem of the labourers also received attention. Medical and Conservancy staff were also increased. Many tanks were cleaned out and attention was also given for proper drainage for the coolie lines.

But still they could not check the epidemics as the smaller collieries with limited income could not spend much for conservancy and the disease primarily occurred in those collieries and ultimately became an epidemic. The neighbouring villages were also affected.

A general scheme to supply water to the entire coalfield was mooted and was gone into with some care but this also could not materialise for want of funds as the estimated expenditure was too high. The necessity for a legislation enabling the enforcement of ordinary sanitary rules, was felt. It became necessary to have power to compel the reservation of tanks and wells, to control the manner and place for disposal of the dead, to clear out congested areas and to enforce comparative cleanliness within the neighbouring villages.

At last the Jharia Mines Board of Health came into existence in the year 1913. With the expanding activities of the Jharia Mines Board of Health, gradually the whole of the coalfield area received a different look. The coolie lines were built with some regard to proper sanitation, drainage, etc. Each large colliery was compelled to have a Medical Officer and hospital of its own in order to render first-aid to the patients of that colliery.

The collieries had to pay a cess of 100 tons of coal raised from their mines which varied every year. The cess for the year 1954 was Rs. 5-14-0 per 100 tons which did not fall much upon the owners and at the same time each and every colliery is benefited by the Board.

Sanitary measures taken during mela time.

Sanitation during fairs and *melas* has to be carefully watched and controlled to check epidemics. The weekly *bazars* held in large villages and important annual fairs where there is a large assembly encourage to spread infectious diseases. Vaccination and inoculation against small-pox and cholera are given in fairs and *melas*. Popular talks are given to spread the knowledge of sanitation. The important annual *melas* of the district are held at Tundi, Dhanbad, Balliapur, Chas, Gobindpur and Jharia. These *melas* have to be watched.

AYURVEDIC AND UNANI DISPENSARIES.

The District Board of Dhanbad has opened nine *Ayurvedic* dispensaries at Jharia and other places.

There is a *Unani* dispensary at Nawadih managed by the District Board. It cannot be said that these two indigenous systems are popular in the district.

HOMEOPATHIC SYSTEM.

This system has become quite popular because of the cheap medicines.

There are 5 Homoeo dispensaries managed by the District Board at Lowadih, Ghoghra, Brahmandiha, Phularitand and Khamarbendi. Besides there are five subsidised dispensaries at Lodna, Magri, Matari, Deoli and Laghla. Each dispensary is under the charge of a Homoeopathic doctor who gets his pay from the District Board. There is no facility of indoor patients in these dispensaries.

ACTIVITY OF THE INDIAN MEDICAL ASSOCIATION, DHANBAD.

In the year 1938 a branch of the Indian Medical Association was started at Dhanbad. There were only 35 members when the branch was opened. Now (1962) the strength of the member of the Dhanbad Branch of the Indian Medical Association has increased to 154 members. The members of the Dhanbad Branch of the Indian Medical Association hold medical conferences annually. They deliver

lectures on medical problems. A health week is also observed usually in the month of March when stress is given, for examination of the school boys are held and popular lectures are delivered. Sports and competitions are also organised. The members help at the time of emergencies like outbreak of cholera, small-pox, etc.

WATER-SUPPLY.

To solve the water problem in the coalfields, the Jharia Water Board was formed in the year 1914 under the Jharia Water-Supply Act, 1914. A big dam—375 feet long, 78 feet and 25 feet wide—was constructed at the foot of the hills near Topchanchi about five miles north from the Gomoh Railway Station by the side of the Grand Tunk Road. The construction work of the dam was taken up in the year 1915 and was completed on the 15th November 1924, when it was opened by His Excellency Sir Henry Wheeler, the then Governor of Bihar. It was constructed at an estimated cost of Rs. 50,00,000 with a capacity of storing about 1,15,00,00,000 gallons of water. It was capable of supplying water to the entire coalfield even if there had been drought for four successive years. But with larger demand, Topchanchi reservoir is not able to supply water during summer season and a second big reservoir was constructed at Tetulmari to preserve the excess water of Topchanchi during rains. Topchanchi water is supplied to collieries door to door and even to the neighbouring towns and thus a big problem was solved.

The rate of cess charged from the collieries and public for the consumption of water is different.

The most of the collieries have pit-head-baths where labourers coming out of the mines after strenuous work can get themselves washed, refreshed before they leave colliery premises.

In many collieries, the water pumped out of the mines or from the abandoned quarries, is supplied to their employees for bathing and washing purposes and the Topchanchi water is only used for drinking purpose. The headquarters of both Jharia Mines Board of Health and Jharia Water Board are at Dhanbad. The Water Board has got its offices at Topchanchi, Tetulmari, Kusunda and Jharia. Till 1954, Dhanbad town did not have pipe water-supply for the public in general. But some of departments such as Eastern Railway, Indian School of Mines and Applied Geology, Dhanbad Civil Hospital, Jharia Mines and Water Boards, Department of Mines, had and have got their own arrangement for pipe water. Most of the dwelling houses have got their own wells. The supply of pipe water for the municipal area of Dhanbad town has been in existence since 1960. There are two water towers which have been constructed in 1960 by Public Health Engineering Department. Their capacity is 1 lakh gallon of water. The details will be found in the text on Local Self-Government.

Jaggiwannagar, the newly-built town has got its own water-supply and the arrangement is quite satisfactory.

MALARIA AND ANTI-MALARIAL MEASURES.

The endemic home of malaria in the district is at the foothills and swamps and ditches where water accumulates. The district was an abode of malaria till 1949-50 and Topchanchi was the main centre.

The Government of India with the co-operation of World Health Organisation and other local and international organisations had started the National Malaria Control Programme in Dhanbad in 1950. The Anti-Malaria Department of Dhanbad is the one of the circles of Santhal Parganas district with its headquarters at Jamtara. The circle headquarters of Anti-Malaria Department is at Dhanbad. The Anti-Malaria Officer is the administrative head of the circle. There are sub-units at Jharia, Topchanchi and Chas in this district. The sub-units are looked after by a supervisor.

The following statistics given below will show the malaria cases of the district:—

Year.				No. of malaria cases treated.
1956	..	..	..	7,689
1957	..	..	..	5,788
1958	..	..	..	4,525
1959	..	..	..	2,375
1960	..	..	..	1,345
1961	..	..	..	765

From the above statistics it can be observed that the malaria cases came down to 765 during 1961 which was 7,689 in 1956. It may be said that malaria has been somewhat controlled. There is no doubt that many cases never come to the hospitals.

CONCLUSION.

The survey of public health and medical facilities would show that a good deal of progress has been achieved so far as the facilities for the colliery labourers are concerned. The recent programme of the Government in starting a number of Blocks to cover the district and to give a doctor with some staff to each of the Block is calculated to streamline the public health and medical facilities provided the doctor works with missionary zeal and is unmindful of his private practice. It is unfortunate that while the colliery hospitals and dispensaries whether started by the Centre or by the collieries should be well equipped and well staffed, the Government hospitals and dispensaries should continue to be rather ill-equipped and ill-staffed in comparison.

There are no private hospitals and Nursing Homes. There are no medical and public health research centres or institutions. The coal dust and smoke that fill the sky over the collieries form a problem for the proper maintenance of health. The poor diet with insufficient caloric value that is normally taken by the common man cannot be conducive to proper health. Drunkenness is common. The incidence of leprosy and venereal diseases is quite high.

There appears to be a concentration of medical practitioners in the urban areas and a dearth in the rural areas. The number of qualified medical practitioners could not be obtained. There is no statutory obligation for a doctor to register his name locally and very few of the doctors are members of the branch of the Indian Medical Association. Not a single doctor has been reported to be doing any research. No team has been working on any medical problem in an integrated manner although this industrialised district has its indigenous medical problems like smog, industrial diseases, proper diet for the heavy workers, etc. The influence of the typical industrial work upon the mental health of the individual and the community has not yet been attempted to be studied in Dhanbad district which is the Ruhr of India. Dhanbad already has and will have in an increasing way what is described as industrial civilisation and medical and public health services here must be attuned to that aspect and if of the same pattern as anywhere else will not be enough or wholesome.

CHAPTER XIV.

SOCIAL SERVICES AND PUBLIC LIFE.

LABOUR WELFARE.

Labour Organisation.

The office of the Labour Officer, Dhanbad, was established in 1948 to see to the working of the various labour laws. At first there was only one Labour Officer. There are now (1963) one Labour Superintendent and two Labour Officers. Under the Labour Officers there are three Labour Inspectors, two of them posted at Dhanbad and one at Chas. They assist the Labour Officers and the Inspecting Officers in their work. These officers see to the working of the Industrial Disputes Act, 1947, Minimum Wages Act, 1948, the Bihar Shops and Establishments Act, 1953, Motor Transport Workers Act, 1961, etc. One of them has to act as the Conciliation Officer under the Industrial Disputes Act, 1947.

The Coal Mines Labour Welfare Commissioner, Dhanbad, has also employed two Labour Officers for the welfare of the labourers. There are hospitals and Labour Welfare Centres under the Central Government in the district. The details have been discussed in the 'Industries' chapter.

CLASSIFICATION OF LABOURERS.

The labourers of the district may be broadly classified into three categories, namely, Industrial, Agricultural and Commercial. The labourers in this district as in other parts of the State cannot be absolutely categorised excepting the technical labour employed in the industrial units. An agricultural labourer may change his occupation into that of a cartman or he may be employed in some oil or rice mill when he has no employment in the field.

Industrial Workers.

In this district there are 402 factories running with power and 15 factories running without power according to the figure of 1959 registered under the Factories Act. About 22,349 persons are working in this district in the registered factories. Details regarding the workers in the coal mines and factories and the welfare centres have been discussed in the 'Industries' chapter.

Agricultural Labourers.

Agricultural labourers are mobile and have no obligation to work in a particular zone or for a particular wage unless they are of the category of tied labourers having received earlier some land or cash advances. Females and children also help in agricultural operations.

Wages are more or less fixed and usually in cash or some *doles* along with cash. Hours are not fixed and employment also is not assured. The labourers are usually employed for particular agricultural operations and on the average they get employment only for 6 to 8 months in the year. Their wages are much less than that of the industrial labour. Their economic condition is poor and their standard of life unless they have some lands of their own, is definitely poorer than that of the average industrial labourer.

On an enquiry regarding the rates of wages in Bihar it was found:—"In Bihar, in August, 1951, the wages of field workers were between Rs. 1-2-6 and Rs. 1-10-0 in case of men and between Re. 0-12-0 and Rs. 1-8-4 in case of women."* These rates have somewhat gone up now.

THE MINIMUM WAGES ACT OF 1948.

On 11th April, 1946, Dr. B. R. Ambedkar, the then labour member in the Government of India introduced a Minimum Wages Bill, but the passage of the Bill was considerably delayed by the constitutional changes in India. It was passed in March, 1948, and is known as the Minimum Wages Act of 1948. The aim of the Act is to fix minimum wages in certain employments. Agricultural workers are covered on Part II of the Schedule of the Act and it was enforced in Dhanbad in 1955. The Labour Officer posted at Dhanbad has been appointed the Inspecting Officer under this Act for the proper implementation of the Act in the agricultural sector. There are also three Labour Inspectors for looking after the provisions of the Minimum Wages Act, 1948, being carried out in the district of Dhanbad. The following minimum rates of wages have been fixed for agricultural labourers engaged in different agricultural operations:—

- (1) 3 seers 12 chattaks of paddy and 4 chattaks of rice or *chura* or *murhi* or *sattoo* per day for plantation of paddy and also for ploughing. This rate of wages is only given to adult employees.
- (2) 2 seers 4 chattaks of paddy and 4 chattaks of rice or *chura* or *murhi* or *sattoo* per day is given to child employees for plantation of paddy and also for ploughing.

During the years 1960, 1961 and 1962 (up to October), 70, 19 and 5 complaints were respectively filed to the Inspecting Officer, Dhanbad which were disposed of. The Labour Inspectors are making efforts to make the rural agricultural labourers conscious of their rights by making propaganda through canvassing and by distributing pamphlets indicating the fixed minimum rates of wages. It cannot, however, be said that the prescribed minimum rates are

* R. C. Saxena: *Labour Problems and Social Welfare* (Sixth Edition), page 633.

always paid. The rates may also go up if there is a short supply of labourers. There is a lot of mutual agreement between the employer and the agricultural labourers.

So far as the agricultural labourers are concerned, the population of landless labourers in the district is roughly calculated to be about 4,000. Out of this category about 1,000 are tied labourers and the rest are what may be described as casual labourers. Practically no amenities are provided for the agricultural labourers. Usually they are drawn from the villages in the neighbourhood and they go back to their villages in the evening after work. The bonded or tied labourers are usually provided with a hut of very poor quality for residence and are given occasional extra *doles* of grains.

Commercial labourers.

So far as the commercial labourers are concerned, it is roughly calculated to be about 55,000 workers. They are engaged in cloth shops, hotels, cinema houses, *pan biri* shops, sweetmeat shops, etc. According to the Bihar Shops and Establishments Act, 1953, the shops have to be registered. Up to 1961, 11,924 shops were registered. The commercial sector labourers are mostly located at Dhanbad, Jharia, Sindri, Gomoh, Katras and Govindpur. They have one holiday in a week and work for a fixed period of time. No amenities as such are provided for this type of labourers. They are not given housing accommodation nor are they normally given any tea or tiffin. Such facilities are, however, given only to workers of bigger establishments, such as a cinema house or a big canteen.

MOTOR TRANSPORT WORKERS ACT, 1961.

Motor Transport Workers Act, 1961, has been enforced in the district of Dhanbad with effect from 1st March, 1962. The Act applies to every motor transport undertaking employing five or more motor transport workers. Motor transport undertaking will include a private carrier; motor transport worker includes drivers, conductors, cleaners, station staff, line checking staff, booking clerks, cash clerks, depot clerks, time-keepers, watchmen or attendants. For the implementation of the Act the State Government has been authorised to appoint a duly qualified person to be the Chief Inspector and some Inspectors. These appointments have not yet been made and the Labour Officers posted at Dhanbad are expected to see to this work as well.

Facilities to be provided.

The Act provides for rest room, canteen, uniforms, rain coats, and an allowance for washing of uniforms. There are also rules for medical facilities, working hours, etc. The Act prohibits the employment of children in any capacity. Under the Act a worker is entitled for a prescribed period of leave with wages.

An investigation made at Dhanbad suggests that the amenities are not being implemented to any appreciable degree although the number of motor transport undertakings in this district is quite large and the volume of work done is not inconsiderable.

EASTERN RAILWAY EMPLOYEES' WELFARE OFFICE, DHANBAD.

The Eastern Railway employees have been given a number of amenities. There are three Labour Inspectors of Eastern Railway in Dhanbad district to look after this work. Two Inspectors are posted at Dhanbad and one at Gomoh. They are under the Divisional Personnel Officer, Asansol.

There is a 65-bedded Railway Hospital at Dhanbad for the benefit of railway employees. Besides, there are health units at Pathardih, Katrasgarh, Gomoh, Kusunda and Sindri. There is one M.B.,B.S. doctor in each of the health units.

There are canteens at Dhanbad, D. S. Office, Dhanbad Loco Shed, Gomoh and Pathardih. There are also 11 primary schools run by Eastern Railway, six are at Dhanbad, one each at Kusunda, Katrasgarh, Pathardih, Sindri and Gomoh. Besides, there are two English medium schools at Dhanbad and Gomoh and two Hindi and Bengali medium schools at Pathardih and one at Gomoh.

For recreation purposes the Railway has six clubs and institutes in this district. Two are located at Dhanbad, two at Gomoh and one each at Katras and Pathardih. The Railway Institutes at Dhanbad and Gomoh show pictures. All the Railway Institutes subscribe newspapers and periodicals and offer facilities for various games.

Three Railway *Mahila Samities* are functioning in this district, one each at Dhanbad, Gomoh and Pathardih. They are subsidised by Railway and offer a meeting ground for the ladies for social and recreational purposes.

PROHIBITION.

Prohibition is not being implemented by any statutory obligation. The district has quite a sizeable tribal population with whom drinking is almost a social tradition and any statutory imposition of prohibition is likely to lead to underground illicit traffic. *Mahua* trees are in abundance and the tribals and various other castemen grow *mahua* fruits and extract an alcoholic concoction. The tribals also make a rice-beer (*Pachwaye*) at home. Drinking is quite common among the colliery workers and the heavy workers of the factories. It is true, however, that a good percentage of their pay packet goes to the liquor shops and it is almost a social problem. The collieries, factories and some of the commercial concerns have a percentage of foreigners and Indians who are used to consume foreign liquor.

Any prohibition law promulgated in a district like Dhanbad will have many difficulties in its enforcement. The State, however, is trying to implement prohibition by the indirect method of raising

the prices of the intoxicants, restricting the granting of licenses, curtailing the hours of the working of the liquor shops and occasional stopping of the sale of liquor on particular days. There has been an enormous increase in the price of even the country liquor* and whisky and other better type liquors produced by the Indian distilleries. The price of foreign liquor has become almost prohibitive. Bar licenses are very few in number. Oral consumption of opium has been restricted and opium is now sold only to those who have been properly certified medically.

The problem of prohibition offers an excellent field to the social workers.

ADVANCEMENT OF BACKWARD CLASSES AND TRIBES.

The term 'Backward Classes' is generally used to include Scheduled Tribes, Scheduled Castes, Denotified Tribes and other Backward Classes. The Constitution mentions who are the Scheduled Castes, Scheduled Tribes and Backward Classes.

Article 341 of the Constitution empowers the President after due consultation to notify the castes, races or tribes or parts or of groups within castes, races or tribes that are included.

According to 1951 Census as mentioned on page 77 of the District Census Hand-Book (1956, page 77) the population of Scheduled Castes, Scheduled Tribes and Backward Classes is as follows:—

	Persons.	Males.	Females.
Scheduled Castes ..	1,14,438	62,504	51,934
Scheduled Tribes ..	1,14,529	57,137	57,392
Backward Classes ..	84,645	45,803	38,842

They are distributed in all over the district. According to the District Census Hand-Book, 1956, the distribution as per Census of 1951 is as follows†:—

	Scheduled Castes.		
	Male.	Female.	Total.
1. Jharis Revenue Thana (excluding Dhanbad, Jharis and Sindri towns).	24,976	20,893	45,869
2. Topchanchi Revenue Thana	16,785	11,091	28,476
3. Gobindpur, Nirsa and Tundi Revenue Thana.	17,117	13,890	31,007
4. All towns of Dhanbad district (Dhanbad, Jharis and Sindri).	3,620	5,560	9,183

* Details will be found in the sub-section Excise Department of the text General Administration.

† It has to be remembered that Dhanbad was a sub-district in 1951 and has become a district in 1956 with the areas of Chas and Chandankiari added. Hence the figures will go up as there are such people in Chas and Chandankiari as well. The 1961 Census details are not yet available.

	Scheduled Tribes.		
	Male.	Female.	Total.
1. Jharla Revenue Thana (excluding Dhanbad, Jharla and Sindri towns).	12,141	12,726	24,867
2. Topchanchi Revenue Thana	6,481	5,951	12,432
3. Gobindpur, Nirsa and Tundi Revenue Thana.	33,693	33,637	67,330
4. All towns of Dhanbad district (Dhanbad, Jharla and Sindri).	4,822	5,078	9,900

	Backward Classes.		
	Male.	Female.	Total.
1. Jharla Revenue Thana (excluding Dhanbad Jharla and Sindri towns).	25,840	22,117	47,957
2. Topchanchi Revenue Thana	9,273	7,380	16,653
3. Gobindpur, Nirsa and Tundi Revenue Thana.	6,930	4,872	11,809
4. All towns of Dhanbad district (Dhanbad, Jharla and Sindri).	3,754	4,473	8,227

The total number of persons belonging to the Scheduled Castes, Scheduled Tribes and Backward Classes taken together according to the census of 1951 comes to 3,13,612 persons as against the total population of 7,31,700 persons.

The following castes or groups of Dhanbad district were notified as Scheduled Castes under the Constitution (Scheduled Castes) Order, 1950:—

- (1) Bauri, (2) Bantar, (3) Bhogta, (4) Chamar, (5) Chaupal, (6) Dhobi, (7) Dom, (8) Dusadh (including Dhari or Dharhi), (9) Ghasi, (10) Halalkhor, (11) Hari (including Mehtar), (12) Kanjar, (13) Kurariar, (14) Lalbegi, (15) Mochi, (16) Musahar, (17) Nat, (18) Pan, (19) Pasi, (20) Rajwar, (21) Turi.

The following castes or groups of Dhanbad district were notified as Scheduled Tribes under the Constitution (Scheduled Tribes) Order, 1950:—

- (1) Asur, (2) Baiga, (3) Bathudi, (4) Bedia, (5) Binjhia, (6) Birhor, (7) Birjia, (8) Chero, (9) Chik Baraik, (10) Gond, (11) Gorait, (12) Ho, (13) Karmali, (14) Kharia, (15) Kharwar, (16) Khond, (17) Kisan, (18) Kora, (19) Korwa, (20) Lohara, (21) Mahli, (22) Mal Paharia, (23) Munda, (24) Oraon, (25) Parhaiya, (26) Santal, (27) Sauria Paharia, (28) Savar, (29) Bhumij.

The following castes and groups of Dhanbad district have been classified as Backward Classes:—

- (1) Bari, (2) Banpar, (3) Beldar, (4) Bhatiara, (Muslim), (5) Bherihar, (6) Bhuiya, (7) Bind, (8) Chik (Muslim), (9) Dafali (Muslim), (10) Dhanuk, (11) Dhunia (Muslim), (12) Gorhi (including Chhabhi), (13) Hajjam, (14) Kahar, (15) Kasab (Kasai-Muslim), (16) Kewat (Keut), (16A) Khatik, (17) Mali (Malakar), (18) Mallah (including Suraihiya), (19) Madari (Muslim), (20) Miriasin (Muslim), (21) Nat (Muslim), (22) Noniya, (23) Pamaria (Muslim), (24) Sheikhra, (25) Tantis (Tatwas), (26) Turha, (27) Bagdi, (28) Bhar, (29) Bhuinhar, (30) Dhanwar, (31) Gulgulia, (32) Kaibartta, (33) Kanwar, (34) Khetauri, (35) Majhwar, (36) Malar (Malhor), (37) Maulik, (38) Pradhan, (39) Pahira, (40) Tamararia, (41) Kurmi (Mahto), (42) Dhobi (Muslim), (43) Halalkhor (Muslim), (44) Lalbegi (Muslim), (45) Mehtar (Muslim).

As a Welfare State the Government of Bihar has taken up the amelioration of these people as a matter of policy. A separate department at Government level known as the Welfare Department has been created. There is a District Welfare Officer with his headquarters at Dhanbad to implement the Government policy through various welfare measures the entire expenditure of which is met by the State Government. The District Welfare Officer has an Assistant District Welfare Officer, 7 Welfare Inspectors and 22 *Kalyan Gram Sevaks*. The District Welfare Officer has multifarious duties. His main functions relate to the removal of disabilities of Backward Classes, Scheduled Tribes, spread of education, provision of hostels for them, arrangements for loan and subsidies, medical aid, running of grain-golas, sinking of wells, etc. He has to be a live wire and a person of imagination, initiative and sympathy to be doing his duty properly.

Economic Welfare.

Economic indebtedness due to poverty had made most of such people very poor. The *Mahajans* used to take interest at very high rate and realise the money at harvest-time which left very little margin to them to pull through the rest of the year.

GRAIN-golas.

Twenty-seven grain-golas have been established in this district till October, 1962, to give seed on credit and also grain for food in time of scarcity. These grain-golas supply seed at 25 per cent rate of interest for the first year and thereafter $6\frac{1}{4}$ per cent compound interest for each succeeding year. Previously, this facility was for the persons belonging to the Scheduled Tribes only but due to subsequent amendment in the grain-gola rules, Scheduled Castes and other Backward Classes will also get the benefit of these *golas*. The Block Development Officers or Circle Officers have been authorised to sanction the quantity of grain to be granted to the petitioner and usually from 2 to 10 maunds of grain is sanctioned according to the need of the individual and availability of grain in the stock. A good deal of useful work could be done through these grain-golas. The list of the twenty-seven grain-golas is given below:—

Name of the place where grain-gola is situated.	Year in which started.
1. Maharaj Ganj (Tundi P.-S.) ..	1956-57.
2. Raghunathpur (Tundi P.-S.) ..	Ditto.
3. Maniadih (Tundi P.-S.) ..	Ditto.
4. Tundi (Tundi P.-S.) ..	Ditto.
5. Goacola (Tundi P.-S.) ..	Ditto.
6. Latani (Tundi P.-S.) ..	Ditto.
7. Pokharia (Tundi P.-S.) ..	Ditto.
8. Jhinaki (Tundi P.-S.) ..	Ditto.
9. Baliapur (Baliapur P.-S.) ..	1957-58.
10. Kola Kusura (Dhanbad P.-S.) ..	Ditto.
11. Raj Ganj (Raj Ganj P.-S.) ..	Ditto.
12. Topchanchi (Topchanchi P.-S.) ..	Ditto.
13. Dumra (Baghmara P.-S.) ..	1958-59.
14. Telmocho (Baghmara P.-S.) ..	Ditto.
15. Chas (Chas P.-S.) ..	Ditto.
16. Pindrajore (Chas P.-S.) ..	Ditto.
17. Chandankeari (Chandankeari P.-S.) ..	Ditto.
18. Baramasia (Chandankeari P.-S.) ..	Ditto.

These grain-golas have become popular and are rendering useful service.

AGRICULTURAL SUBSIDY.

The agricultural subsidy granted to the agriculturists belonging to Scheduled Castes and Backward Classes from 1957-58 to 1961-62 is as follows:—

Year.				Scheduled Castes.	Scheduled Tribes.	Backward Classes.
				Rs.	Rs.	Rs.
1957-58	..	..	..	8,000	Not available	1,289
1958-59	..	..	..	8,000	12,500	1,289
1959-60	..	..	..	9,468	6,500	4,000
1960-61	..	..	..	6,500	10,000	2,000
1961-62	..	..	..	3,100	10,000	Not available.

The agricultural subsidy is meant for the purchase of bullocks, manure and seed. In view of the large percentage of their population and their poor condition, the amount of agricultural subsidy granted is small.

HOUSING SCHEME.

In order to give a proper roof over the head the poor *Harijans*,* most of whom are without a house, housing scheme was introduced. The construction of houses is sanctioned at an estimated cost of Rs. 1,250 per house, out of which the Government's contribution is Rs. 937.50, i.e., 75 per cent per house. Generally, the beneficiary contributes the remaining portion in form of labour, materials, etc. In the district of Dhanbad 148 houses under State and Central sponsored schemes have been constructed and 68 houses are under construction (1962).

The chart below shows the location of the houses which have been constructed or are under construction:—

Under Central Plan for Scheduled Castes.

Year of construction.	Name of the village.		Under which Block.		No. of houses.
1957-58	..	Dhobani ..	..	Nirsa ..	28
1958-59	..	Radhanagar ..	..	Baghmara ..	19
1959-60	..	Koria ..	..	Chandankiari ..	16
					(Under construction.)
1960-61	..	Bamandarika ..	..	Chas ..	2
1960-61	..	Kesidih ..	..	Tundi ..	14
					(Under construction.)
1961-62	..	Dafar Tupra ..	..	Chas ..	6
					(Under construction.)

* A term coined by M. K. Gandhiji for the lower caste people often considered "untouchable" by the higher caste-men.

Under Central Plan for Scheduled Tribes.

Year of construction.	Name of the village.	Under which Block.	No. of houses.
1958-59	.. Paloobera ..	.. Tundi ..	15
1958-59	.. Kahaiya ..	.. Tundi ..	15
1959-60	.. Bhelaland ..	.. Govindpur ..	18
1960-61	.. Santhal loghela ..	.. Chandaukeari ..	25 (Under construction.)

*Under the State-sponsored scheme for Scheduled Castes and Scheduled Tribes.**Anchal.*

1954-55	.. Mantand ..	.. Topchanchi ..	13
1954-55	.. Hariharpur ..	.. Topchanchi ..	5
1955-56	.. Singhdihi ..	.. Topchanchi ..	7
1958-59	.. Mahuda ..	.. Baghinara ..	6
1959-60	.. Bamandarika ..	.. Chas ..	20
1960-61	.. Kesidih ..	.. Tundi ..	7 (Under construction.)

The houses constructed are in occupation. But considering the vast population these few houses are far too inadequate.

Educational facilities.

As far as the educational facilities of the Scheduled Castes are concerned the Central Government as well as the State Government are interested. The Central Government has a fund for giving scholarships for post-graduate study to the students belonging to the Scheduled Castes, Tribes and Backward Classes. Post-matric scholarships for them from the Central level are awarded by the State Government under authority delegated to them. The State Government also gives stipends, awards and book-grants to students from the school to the college stage.

During 1960-61, Rs. 3,72,533.38 was distributed among 3,397 students belonging to Scheduled Castes, Scheduled Tribes and Backward Classes as stipends, book-grants or awards. Besides, 25 thousand rupees were paid to two colleges for reimbursement of loss in

fee income. In 1961-62, Rs. 6,13,174 were distributed among 4,611 students of the same categories.

HOSTEL.

The following Harijan and Adivasi hostels are now running in the district:—

	No. of boarders (1962)
(1) Welfare Hostel, Dhanbad ..	10
(2) Adivasi Hostel, Tundi ..	25
(3) Adivasi Hostel, Nirsa ..	22
(4) Adivasi Hostel, Gobindpur ..	30
(5) Adivasi Hostel, Rajnagar ..	30

The house-rent and the cost of utensils are borne by the State Government. No seat-rent is charged from the students. Every boarder who belongs to the Backward Classes also gets a grant of Rs. 20. If seats are available after providing the boys for whom the hostels are meant, students of other castes are also admitted but they are required to pay some fees. At present (1962) there are no such students in these hostels. As a matter of fact the hostels should cater for students of other classes as well so that the Harijans and Adivasi boys do not feel and suffer from a feeling of segregation and inferiority complex.

DRINKING FACILITIES.

The Welfare Department, Dhanbad, has constructed wells for the Scheduled Castes and Scheduled Tribes for their drinking facilities. Such wells are usually sunk in their colonies which did not have proper wells. Now they can use the other wells of the villages as well.

The statement given below shows the number of wells constructed and the amount spent:—

Year.	Scheduled Castes.		Scheduled Tribes.	
	Amount spent.	No. of wells completed.	Amount spent.	No. of wells completed.
	Ra.		Ra.	
1953-54	1,200	3	1,200	3
1954-55	3,000	5	3,000	5
1955-56	3,000	4	3,050	3
1956-57	21,000	8	34,000	12
1957-58	9,000	7	17,000	10
1958-59	9,500	13	15,000	10
1959-60	4,200	Not available	26,612	Not available.
1960-61	8,100	Ditto	14,790	Ditto.
1961-62	5,300	Ditto	11,835	Ditto.

The Government contributes 75 per cent of the estimated cost and the villagers are required to contribute the remaining portion by giving labour. It is rather unfortunate that the District Welfare Office could not supply the number of wells sunk although they have got the figures of money spent. They also could not give details regarding their location. This is for the recent years.

HILL PATHWAYS AND VILLAGE ROADS AND BRIDGES.

The following roads, bridges and culverts have been constructed by the Welfare Department for the benefit of the Adivasis and Harijans:—

Year.	Name of the roads, bridges and culverts.	No. of mils.	Amount spent.
			Ra.
1957-58	(1) Sadhubad to Maniadih ..	.. Not available	31,925
	(2) Bhuribinsose to Bhojudih ..	8	22,000
1958-59	(1) Begnoria to Dongapani ..	12	12,500
	(2) Dongapani to Tundi ..	2	6,000
1959-60	(1) Palmo-Domarpur road ..	4	4,300
	(2) Behaechia-Palmo road ..	3	10,000
	(3) Tindi-Dongapani road ..	2	3,500
	(4) Construction of three big <i>nalas</i> ..	..	600
	(5) Construction of five culverts in Begnoria-Dongapani road. ..	..	5,000
	(6) Construction of six culverts on Tundi Dongapani road. ..	..	6,000
1960-61	(1) Construction of one bridge on Begnoria-Bahechia road. ..	..	7,000
	(2) Construction of four causeways on Begnoria-Bahechia road. ..	..	7,400
	(3) Construction of two causeways on Tundi-Dongapani road. ..	..	2,500

MEDICAL FACILITIES.

The Welfare Department gives aid for medical treatment to the persons belonging to Scheduled Castes, Scheduled Tribes and Backward Classes. The statement below supplied by the Welfare office gives details:—

Year.	Scheduled Castes.		Scheduled Tribes.		Backward Classes.	
	Rupees spent.	No. of persons benefited.	Rupees spent.	No. of persons benefited.	Rupees spent.	No. of persons benefited.
1	2	3	4	5	6	7
1958-59	..	140	2	Nil	Nil	Nil.
1959-60	..	825	14	500	7	200
1960-61	..	825	15	500	8	200
1961-62	..	2,000	31	2,100	38	Not available.

As it was doubtful if the scheme was working properly this has since been dropped for the Backward Classes.

INDUSTRIAL SUBSIDY.

During 1959-60 Rs. 2,095, in 1960-61 Rs. 1,900 and in 1961-62 Rs. 2,000 was given to the Scheduled Castes and Scheduled Tribes for starting cottage industries like basket-making, rope-making, leather work, etc.

This scheme on investigation did not look to be working well. The amount given are also very small and cannot help to start any cottage industry on a sizeable scale.

CHARITABLE ENDOWMENTS.

The following is the list of the Hindu Religious Trusts existing in the district:—

- (1) Hindu *Mandir Samiti* Saharpur,
P. O. Sindri, Dhanbad.
- (2) Sri Peyare Das Lakshmi Narayan
Mandir, Rasa, P. O. Rasa (West Bengal). } Its property lies
in the district.
- (3) Sri Jugal Kishore Daripa, Trustee,
Chandil Durgasthan, P. O.
Chandil, Dhanbad.
- (4) Sri Radha Pati Chatterjee, Trustee,
Lalpur Temple, P. O. Lalpur,
Burdwan (West Bengal).
- (5) Shri K. P. Lal, Trustee, village Khar-
khari, P. O. Nawagarh, Dhanbad.

No detailed information of these Trusts could be had from the President of Bihar State Board of Religious Trusts, Patna. It appears the Trusts are for maintaining some temples.

There is a Religious Trust of the Sunni sect of the Muslims known as Sheikh Chunnu and Sheikh Modi. The Trust maintains a mosque at Jharia. It has been registered in the office of the Bihar *Subai Sunni Majlis-e-Waqf*, Gulabbagh, Patna-4. Previously there was only a mosque which was looked after by the Trust. Since there was no income from the mosque six shop rooms at Katras, were constructed in the *parti* land by raising loans which is being paid gradually by the trustees.

Sree Sree Lakshmi Narain Trust.

This Trust was founded in 1945 by Shri Harishankar Worah of Dhanbad. The Trust has been assigned a colliery (East Kumardhubi Colliery). The colliery raises coal to the tune of 1,00,000 tons a year and its entire income is applied to public charities particularly for education and medical aid.

The first important endeavour of the Trust in the field of education started with the establishment of Sree Sree Lakshmi Narain Trust Girls' High School at Dhanbad in 1956-57. A number of buildings were constructed at a reported cost of Rs. 3,50,000. In 1958 the high school was handed over to the State Government of Bihar.

The Trust purchased a plot of land for Rs. 50,000 and a building for Rs. 1,45,000 at Dhanbad for Sree Sree Lakshmi Narain Trust Mahila Mahavidyalaya. An existing Girls' College was taken over. The Trust wants to construct a new building for the Girls' College.

In 1961 the Trust established a Maternity Home with 28 beds at Dhanbad at the cost of rupees four lakhs. There is a medical staff. The patients are admitted in the Home at the charge of Rs. 5 per bed per day. Poor patients are treated free.

The Trust has constructed one Science Block at Kumardhubi High School in 1961 at a cost of Rs. 50,000.

Some of the other institutions which have been recipients of financial aid from this trust are Raja Shiba Prasad College, Jharia, Anugrah Narain Sinha College, Barh, Jharia Gujrati School, Jharia, D. A. V. College, Ambala City and Shri Kanya Gurukul, Haridwar, etc.

A REVIEW.

Regarding social services in the district it may be mentioned that it is only after the Independence in 1947 that the character of the State has been changed into that of a Welfare State and social work for the people has been taken up as one of the responsibilities

of the State. As we have now a socialistic pattern of Government in view there has to be necessarily more concentration on social work to uplift the vast sections of people who are extremely poor and have suffered grievously in the past from the ill effects of caste system, poverty, want of education and other disabilities. The Constitution has laid down a list of tribes and castes who come in this category of the really down-trodden people and they are described as Scheduled Tribes, Scheduled Castes and Backward Classes. In the past, i.e., before Independence very little work had been actively done to upgrade them. Such work was mostly sponsored by the Christian Missionaries and a few other voluntary social organisations like Ram Krishna Mission, etc. But it is the Christian Missionaries who had penetrated into inaccessible parts of the district and had opened schools and dispensaries. It is correct that the Christian Missionaries had also the object of spreading Christianity to the masses and particularly to the people who were treated as outside the pale of Hindu religion more because of their caste disabilities or economic condition. The Christian Missionaries have done quite a lot of such work in the district. As a matter of fact, some of the earliest schools and well run hospitals and dispensaries are sponsored by them. Their magnificent social work should not be belittled because of their zeal to spread Christianity.

It is unfortunate that the upper classes or castes among the Hindus practically did so little for such tribes or castes. It is only now that some organisations have been set up but they mostly depend on State help for carrying on their work. There are also some complaints as to whether they have been able to do what could have been done because of the great financial aid. It will not be incorrect to state that for the financial aid received from the State many of such organisations would stop working. It is found that there are some old Trusts but they are mostly meant only to run temples or charitable institutions entirely connected with a particular religion.

Social work has been described as the process of helping people with the aid of appropriate social services, to resolve or mitigate a wide range of personal and social problems which they are unable to meet successfully without such help. This kind of help is nothing new in the district as there had always been some good neighbours or doctors or teachers and a few philanthropists to help the people in need. But there has been very little of a properly organised system through which a voluntary guild could do social work which also requires a certain amount of training and experience. A spasmodic emergency like an earthquake or an epidemic stands on a different footing and such emergencies will probably necessitate even inexperienced men to join up for rendering social service. But if there has to be a sustained twelve months' work with fixed objectives, there has got to be a system that can only be properly worked through experience and knowledge. Social worker

like occupational therapists, health visitors, etc. cannot be obtained just for asking. It is because of the want of such properly trained men who have taken up humanitarian work as their mission that the most of the present-day social service organisations are not working properly.

Another peculiar aspect of the social service organisations that are found within the district is that they are all more or less concentrated in the urban or semi-urban areas and as mentioned before, more or less, entirely depend on Government help. They have also an extremely limited scope of work. Even in the district headquarters there are no Women's Voluntary Service, no Citizens' Advice Bureau, hardly any institutions to do moral welfare work or look after people without homes or to help the sick and disabled. There is no institution to help the children deprived of normal home life or to protect children from ill-treatment or neglect. There are no institutions to look after the convicts after their discharge. No one worries about the handicapped or incapacitated young or old people or the delinquents. Old age problems are never thought of. The educational institutions also have very little activities on these lines. The problems of the students are certainly not given that much of thought that they deserve. Giving a few stipends is the least that can be done.

The idea of the State offering social security to the country is also a very recent idea. During the British regime this was not one of the main objectives to be followed by the administration. Even now after Independence and even with a Welfare State based on socialistic pattern, there has not been much of growth of social security provisions. In comparison to Great Britain it may be said that here the people are just at the very initial stage. To start with, there is no Poor Law in the country. There is no system of National Insurance. There are no Acts like Family Allowances Act, 1945 of Great Britain. There has been nationalisation of life insurance and the people have to go a long way yet before they get anything like the National Insurance Act of Great Britain. It may be that the people are economically or educationally not so much advanced that there could be a statutory obligation for every person of working age, i.e., between 16 and retirement at or after minimum pension age, whatever his or her income or position of life, is legally bound to take part in the scheme. People have got the very beginning of an insurance system for the factory workers. But there are no statutory obligations on the people or on the State to offer sickness benefit, unemployment benefit, maternity benefit, retirement pension or death grant as it is in Great Britain. Industrial Injuries Insurance is now covered but the number of hospitals and dispensaries for the industrial workers are still very few.

NEWSPAPERS.

So far as the newspapers published from this district are concerned, it has already been dealt in the chapter on Education and Culture.

There are several English dailies published from elsewhere that have got a good circulation in this district. They are the *Indian Nation* and the *Searchlight* published from Patna and the *Statesman*, the *Hindustan Standard* and the *Amrita Bazar Patrika* published from Calcutta. Among the English weeklies and periodicals published from elsewhere that have some circulation mention may be made of *Bihar Herald* (Patna), *Blitz* (Bombay), the *Illustrated Weekly* (Bombay) and *Link* (Delhi). The *Aryavarta*, the *Pradeep* the *Vishvmitra* and the *Navarashtra*, the four Hindi dailies published from Patna have also a fair circulation in the district. The Bengali dailies of Calcutta, *Ananda Bazar Patrika* and *Yugantar* have a wide circulation. The three Urdu dailies of Patna, *Sada-e-Aam*, *Sangam* and *Sathi* have a small circulation in this district. Some Hindi periodicals published from elsewhere, namely, *Dharmayug*, *Hindustan*, *Maya* and *Manorma* have also some sale. The district having a larger urban population and a good percentage of literate and educated people, the incidence of reading public is quite large. The newspapers and the periodicals in the libraries are read by a large number of people. In the rural libraries also, language newspapers are in fair demand. The newspapers have a considerable influence in shaping public life.

VOLUNTARY SOCIAL SERVICES.

A number of institutions have recently been sponsored in Dhanbad district with the object of doing social services. They are more or less, dependent on Government help or on the aid given by the Central Social Welfare Board, *Bharat Sevak Samaj* and such other institutions who also depend for aid by the Centre or the State, Voluntary Philanthropic institutions like the Servants of India Society of Poona or the Ram Krishna Mission are very few. The zamindars some of whom had social institutions themselves and discharged their social obligations in an appreciable manner have given up their philanthropic activities after zamindary has been abolished. The schools, colleges, dispensaries, etc., sponsored by them have either been languishing or have been taken up by the State. It is very unfortunate that there has been a tendency since recent years to start a voluntary social institution and quickly run for Government aid. Another unfortunate feature is that in case of a great calamity like floods or famines or epidemics, very few of voluntary social service institutions now come forward to serve the suffering humanity as they used to do in the past. People have been now looking more and more to the State in all such emergencies.

Harijan Sevak Sangh.

A branch of the All-India *Harijan Sevak Sangh* was started in Dhanbad in 1945. The institution is more concerned with arousing public consciousness regarding the condition of the Harijan and publishes brochures, etc., and also arranges meetings.

The *Sangh* has two centres, one at Sarai Dhela, P.-S. Dhanbad and the other at Lambikulhi, P.-S. Chas. It has also started a co-operative society and advances loans at a nominal rate of interest.

Arya Samaj.

The *Arya Samaj Mandir* was established in 1933 at Dhanbad. Essentially a religious institution the *Arya Samaj* branches associate themselves with various social service work like widow-marriage, inter-caste marriage, rehabilitating the helpless and the abandoned women and children, etc. The *Arya Samaj* also runs the D. A. V. Higher Secondary School and D. A. V. Middle School at Dhanbad and has branches at Sindri, Jharia and Katras.

Bhoodan Movement.

The Bhoodan Movement was started in 1951 by Sri Vinoba Bhawe. It seeks to bring about a peaceful agrarian revolution in the country. The movement consists of the collection of land from big land-owners as gift and the distribution of the same to the landless persons. Bhoodan movement appeals for voluntary donation of one-sixth of the land for redistribution among the landless and the distribution takes place at village meetings at which villagers decide whose need is the greatest.

The Bhoodan Committee Office was established in 1957 at Dhanbad. Up to August, 1962, 7,625 acres of land was collected as gift out of which 1,872 acres of land was distributed among 1,175 landless persons. Out of 1,175 beneficiaries, 390 are Scheduled Tribes, 438 Scheduled Castes and 344 beneficiaries belong to Backward Classes.

Ram Krishna Vivekanand Society, Dhanbad.

This Society was established in 1936. The building was donated by Sri B. N. Chakravarty. There is a Committee with a President, Secretary and some members who run the institution.

A library and free reading room, a homoeo charitable dispensary and an allopathic charitable dispensary are run by this Society. The institution is well supported by Dhanbad Rotary Club, Municipality, etc. Very useful work is being done by the Society.

Dhanbad Blind Relief Society.

Established in 1956 at Dhanbad, the Society has opened a Blind School at Bhuli in 1960. This Society is affiliated with the National Association for the Blind, Bombay. The institution receives aid from the State Government. In 1962 there are 25 students who are

given free boarding and lodge. The school has also a library, and music room. At present (1962) education is given up to middle standard. The inmates are also given training in handicrafts and music.

Bharat Sevak Samaj.

The district branch of *Bharat Sevak Samaj*, an All-India organisation was organised in 1953. This institution has a regular office at Jharia. The *Samaj* runs a library and some night schools and has also interested itself in fighting corruption in Government offices and among the public.

Coalfield Muslim Yatimkhana, Dhanbad.

Started in 1946 for the orphan Muslim boys, the institution is run by the contribution of the public and from the income of its landed property. In 1962, there are 75 students. There is a hostel of 5 students at present (1962). Education is imparted free and the hostel-boys are also given free board and lodge.

Anand Marg Pracharak Sangh.

This religious institution has its headquarters at Monghyr. There are branches at Dhanbad, Kumardhubi, Chirkunda, Nirsa, Gobindpur, Rajganj, Topchanchi, Mohuda, Sindri, Lodna and Jharia. The main function of this *Sangh* is to spread religion and spiritual teachings of the great Indian Philosophers among the people.

There are a library and a charitable dispensary attached to the office at Dhanbad. This *Sangh* is run by the contribution of public and has helped the spread of simple religious ideas among the people.

FIRST GENERAL ELECTION OF 1952.

The First General Election after India became independent was held in 1952. The unique feature of this General Election was that for the first time it was held on the basis of adult franchise. In pre-independence period there had been elections to the legislatures both at the Provincial level and at the Imperial Government level but the franchise for the Local Bodies, Provincial Assembly or Council or the Central Legislatures was based on qualifications of property, incidence of payment of revenue, rent or taxes, educational qualifications, communal representations, etc. All this accounted for a low percentage of voters. Adult franchise from 1952 General Election provides equal opportunities for men and women of all classes, caste and creeds to exercise their right of vote. It was a great experiment.

Legislative Assembly, 1952.

The election was held for the Legislative Assembly and Parliament from the 4th to the 24th June, 1952. It has to be remembered that in 1952 the present district of Dhanbad was a sub-district and

a part and parcel of Manbhum district. In 1952 there were five constituencies in the Legislative Assembly (*Vidhan Sabha*) including the combined constituency of Para-cum-Chas. Para is now in Purulia district of West Bengal since 1956. There were two plural constituencies, viz., Tundi-cum-Nirsa, Para-cum-Chas and the rest were single constituencies excepting Para area. The other areas of the constituency in 1952 Assembly election are now in the present Dhanbad district. The number of voters in 1952 election was 3,69,456. This number, of course, included a population of Para as well. Several political parties had set up their candidates for contesting the election for seven constituencies. There were also Independent candidates. The political parties that contested were the Congress, Janta, Socialist, Jharkhand, Praja, Forward Block (Marxist), Communist and Jansangh. The details of 1952 General Election for the Assembly seats have been discussed elsewhere.

Parliamentary Election.

There was no separate and independent constituency for the Parliamentary seats from Dhanbad. There were only two Parliamentary constituencies in Manbhum district, Manbhum North and Manbhum South-cum-Dhalbhum. Dhanbad came within Manbhum North constituency.

The political parties that contested were Congress, Lok Sewak Sangh, Kisan Mazdoor, Praja Party, Janta and Forward Block (Marxist). There was one independent candidate also. Out of the seven seats for the Legislative Assembly, four seats were won by the Congress, two seats went to the Independent candidates and one seat to a candidate run by Janta Party. Topchanchi had a total number of electors of 47,726 and the number that voted was 18,283. The percentage of electors that exercised their franchise was rather poor. This constituency covers rural areas and that may be a reason for poor polling. There was an Independent candidate who polled 399 votes. In this constituency the elected candidate came from Janta Party and polled 9,734 votes. His nearest rival was a Congress candidate with 7,216 votes. The total number of electors for Katras constituency was 55,537 and 21,401 persons exercised their franchise. Here a lady who had contested as an Independent candidate was elected with 8,423 votes. The Independent candidates and a Communist candidate polled very few votes.

In Tundi-cum-Nirsa constituency out of 95,208 electors as many as 34,080 persons chose to exercise their franchise. In this constituency there were two seats out of which one was a reserved seat. The Congress candidates bagged both the seats and had polled 14,711 and 14,575 votes respectively. Two Jharkhand candidates came out third and fourth in the list with 8,627 and 7,859 votes respectively to their credit. In this constituency the Independent, Praja and Forward Block (Marxist) candidates did not get much support. Dhanbad constituency had 51,619 electors. In this

urban constituency, however, only 18,788 voters exercised their franchise. The elected Congress candidate polled 10,253 votes and his nearest rival was a Jansangh candidate with 3,215 votes. There were as many as five Independent candidates who polled very few votes. Para-cum-Chas constituency had 1,19,366 electors. In this constituency 30,562 voters had exercised their franchise. Here an Independent candidate won the seat after polling 12,832 votes while his nearest rival Congress candidate had polled 12,327 votes. The reserved seat went to a Congress candidate. So far as the Parliamentary Election for 1952 is concerned, out of 6,88,360 electors for Manbhum North constituency 2,17,562 was voted. There were two seats and one was reserved. Both the seats went to the Congress candidate. The Congress candidate for the open seat had polled 92,752 votes while his nearest rival, a candidate from Lok Sewak Sangh had polled 83,209 votes. Here also the Independent, Kisan Mazdoor Praja Party and Forward Block (Marxist) candidates did not do well.

Certain conclusions may broadly be arrived at from the analysis of the election results. The Congress had polled a large number of votes and four of the seven seats had gone to the Congress candidates. This shows that the Congress had a good organisation. It is remarkable that Janta Party candidate had chosen to contest only one constituency (Topchanchi) and the candidate had captured the seat. The Party did not want to go into any hazard and contested only in one constituency where the Party had a good hold. The Jharkhand had contested only one constituency Tundi-cum-Nirsa but could not succeed. Independent candidates as a class did not do well although one Independent candidate, a lady from Katras had won the seat. This was due to the local influence of the candidate. Only one constituency Katras had a Communist candidate who polled very few votes. Political parties like the Socialist, Praja and Forward Block (Marxist) and Jansangh had very poor results. This was probably due to the weakness of their organisation. The picture is clear that Congress was the most organised party which had influence in the rural areas as well.

SECOND GENERAL ELECTION OF 1957.

The Second General Election was held on the basis of the electoral rolls made in 1952 subject to modifications made in the course of the five years. The polling was staggered over a period of 16 days from the 25th February to the 12th March, 1957. It has to be remembered that before the election in 1957, Dhanbad had already become a full-fledged district. For Parliamentary seats there was only one constituency known as Dhanbad constituency.

Assembly Election.

In 1957 General Election the number of constituencies was five, namely, Topchanchi, Dhanbad, Nirsa, Chas and Tundi. Nirsa and Topchanchi were plural constituencies and the rest were single

constituencies. It is remarkable that all the seven seats of the Assembly were captured by the Congress, but the voting analysis does not show that the Congress had polled the majority of votes in all the constituencies.

The fact that a large number of candidates had contested meant a division of votes and apparently the Congress candidates belonging to a well-organised party which had formed the Government after the last election had certain incidental advantages. In Chas constituency 20,145 electors exercised their franchise and the Congress had polled 5,123 votes. In Tundi constituency out of 18,884 voters that had exercised their franchise the Congress party had got the support of 5,889 voters. The solitary Parliamentary seat went to a Congress candidate who had polled 67,125 votes out of 1,39,612 votes cast.

The political parties other than the Congress that had contested were the Communist, Jharkhand, Janta and Praja Socialist. There were also a number of Independent candidates.

GENERAL ELECTION OF 1962.

In comparison to the last two General Elections, the third General Election took much less time in completing the poll and in announcing the election results. With the experience of the First and Second General Elections and of the bye-elections in the intervening period a significant change in the method of casting a vote was adopted this time to avoid all probable chance of using unfair means. Previously a voter was required to put the ballot paper in the ballot box of the candidate of his choice and there were as many separate ballot boxes (one for each contesting candidate) as the contesting candidates. In 1962 General Election there was only one common ballot box for all the contesting candidates of a constituency and the elector was to give the seal against the symbol and in the space provided in the ballot paper for the candidate in whose favour he wanted to exercise his franchise.

The ballot contained all the symbols of the contesting candidates of a particular constituency and a space was provided against the symbol of each of the candidate for giving seal therein.

The other important change was brought in respect of the double member constituencies which were converted into single member constituencies. Generally a double member constituency was made reserved for the Scheduled Castes and Scheduled Tribes.

1962 Assembly Election.

In 1962 General Election there were 7 single member constituencies for Legislative Assembly out of which 4 seats were captured by the Congress and 3 by the Swatantra. The total number of electors in 1962 in Dhanbad for the Legislative Assembly was 5,14,881 as against 4,79,039 in 1957. Fifty candidates contested the election

out of which seven belonged to the Congress, seven to Swatantra, seven to Jharkhand, six to Socialist, four to the Communist Party of India and three to the Praja Socialist Party. There were also 14 Independent candidates.

Parliamentary Election of 1962.

As in 1957 there was only one Parliamentary constituency.

In 1962 Assembly Election there were 73,970 electors in Topchanchi constituency out of which 36,043 or 48.7 per cent electors polled their votes. A candidate from the Swatantra Party was elected with 18,899 votes. His nearest rival was a Congress candidate who bagged only 9,260 votes. The Praja Socialist Party, Jharkhand and Independent candidates were badly defeated. The Independent candidates got the lowest votes. In Kenduadih constituency out of 71,610 electors only 31,322 or 44 per cent electors exercised their franchise. The Congress candidate with 15,685 votes was elected. Its nearest rival was a candidate from the Swatantra Party who bagged only 7,041 votes. The other candidates were from the Praja Socialist Party, Socialist Party, Jharkhand and the Communist Party of India. They all bagged very poor votes.

In Dhanbad constituency out of 70,846 electors only 34,896 or 49.5 per cent electors availed of their franchise. The Congress candidates of the Communist and Praja Socialist Parties also got very few from the Swatantra Party who bagged only 3,591 votes. The Independent and Jharkhand candidates got very few votes. The candidates of the Communist and Praja Socialist Parties also got very few votes but came off better than the Independents and the Jharkhand candidates. There was only one Jansangh candidate who polled 2,680 votes.

In Tundi constituency 16,834 votes were polled which meant 26.74 per cent of the electors had exercised their franchise. The Swatantra candidate with 10,931 votes captured the seat while the nearest rival was a Congress candidate with 1,834 votes. Here also the Independents, Socialist and Jharkhand candidates polled poorly. In Nirsā constituency the Congress candidate had won with 10,381 votes. The nearest rival was a Swatantra candidate with 8,997 votes while the Communist candidate came out third with 7,084 votes. The Socialist, and the Jharkhand candidates (one from each party) polled near about 1,000 votes each. In this constituency 30,127 electors or 41.2 per cent had cast their votes.

In Jorapokhar constituency 39,974 votes were polled which meant 48 per cent of the electors had exercised their franchise. The Congress candidates with 14,931 votes captured the seat while the nearest candidate came out third and the Swatantra fourth with 6,749 and 3,840 votes respectively. The Jansangh and Socialist candidates

(one from each party) polled near about 1,100 votes each. The Jharkhand candidate polled poorly. In Chas constituency Swatantra candidate was elected with 11,703 votes. The nearest rival was an Independent candidate with 6,756 votes while the Congress candidate came out third with 4,787 votes. The three other Independent candidates with 3,517, 2,766 and 1,771 votes respectively came out fourth, fifth and sixth. The Socialist and Jharkhand candidates polled poorly. In 1962 Parliamentary Election there were 4,51,555 electors in Dhanbad constituency out of which 2,07,276 or 45.9 per cent electors availed of their franchise. The Congress candidate with 75,170 votes was elected. The nearest rival was a Swatantra candidate with 50,964 votes while the Independent and Communist candidates with 34,405 and 22,742 votes came out third and fourth respectively. The Socialist, Jansangh and Independent candidates polled poorly.

The voting analysis and the other trends of 1962 elections indicate that the Swatantra Party had emerged as a powerful rival of the Congress. Out of the seven seats for the Assembly as many as three were captured by the Swatantra Party candidates while the Congress won the other four seats. The Swatantra Party is not a new party altogether so far as Bihar is concerned. The Janta Party with the Raja of Ramgarh in Hazaribagh district as its head had already made its influence felt particularly in Chotanagpur and Santhal Parganas for sometime past. The Janta Party leaders joined the Swatantra Party which is an all India party and apparently the party had made inroads in other camps. The Jharkhand Party did not do well at all in any of the constituencies that it had contested. The decline of Jharkhand Party as a political force is another remarkable feature in 1962 elections. The other parties of all-India stature like Jansangh or Socialist or the Communist did not do well at all.

The organisational character of the two parties, namely, the Congress and the Swatantra was on a sounder footing than that of the others. The fact that each of the constituencies was fought by a large number of candidates helped the candidates of these two parties. But this factor alone does not explain all the results. A lady candidate of the Congress Party had been elected from Topchanchi constituency in 1957 election and had polled 26,467 votes while the Janta candidate had polled 21,487 votes. In 1962 election the same Janta Party candidate fought on Swatantra Party ticket and was elected with 18,899 votes, while the self-same lady candidate of the Congress Party got only 9,260 votes. There is no doubt that the voters now like to be nursed and a successful candidate will have to serve and nurse his constituency for the next few years. The voting analysis, however, does not give a clear picture of the voters' mind. The Swatantra Party had come out very poorly in some of the constituencies. In Dhanbad and Jorapokhar they got poor votes. As a

party the Socialist and the Praja Socialist Party with very little of ideological differences almost stand to loose their hold. The Jharkhand Party has also dwindled in its influence if the votes cast could be taken as an indication. The Communists appeared to have got good influence in certain pockets like Nirsa and Jorapokhar which are colliery areas. The Communist candidates got poor votes in Dhanbad, another colliery area as well as in Kenduadih. This will show that the voters do not always vote for the party but occasionally for the man. This leads to the other conclusion that even a well-organised party like the Congress or the Swatantra would have to select their candidates after considering various factors and the most important of which will be the influence of the particular man chosen and the local circumstances. The 1957 elections had shown the Congress Party at its peak—this party had captured all the seven Assembly seats and the solitary Parliamentary seat. It was almost like voting for the Party and not for the man selected but this was not the trend in 1962.*

* This text is based on—

- (1) *Report on the First General Election under the Constitution of India in Bihar, 1951-52*, pp. 89, 63-64.
- (2) *Report on the Second General Election in Bihar, 1956-57*, pp. 104, 181-182.
- (3) Other statistics and information gathered from the office of the Chief Electoral Officer, Bihar, Patna.

CHAPTER XV.

PLACES OF INTEREST.

ANGARPATHER.—A town in Baghmara subdivision with a total population according to the census of 1961 is 6,001, i.e., 4,027 males and 1,974 females. The total number of literate persons is 1,069, i.e., 927 males and 142 females.

There are lower and upper primary schools in the town. There are collieries in the town area.

BAGHMARA SUBDIVISION.—This subdivision was created in 1957. It has an area of 506.75 square miles. There are a number of Adibasis, Oraons and Santhals in this subdivision. It is on the western side of the district. The Subdivisional Officer of Baghmara has his headquarters at Dhanbad and holds his court and office there (1962).

There are five thanas, namely, Baghmara, Topchanchi, Chas, Chandankiary and Katras. The chief executive and revenue officer is the Subdivisional Officer who is assisted by other Magistrates and Block Development Officers. The work of the Land Reforms Department is in charge of a Deputy Collector in charge of Land Reforms who is assisted by four Block Development Officers, Circle Inspectors and *Karamcharis*. The Community Development Blocks are located at Topchanchi, Baghmara, Chas and Chandankiary.

The northern portion of this subdivision is full of hills and forests. The Parasnath peak rising to a height of 4,480 feet is close to the border of this subdivision and forms a conspicuous feature of the landscape.

The important rivers in the subdivision are Damodar, Katri and Khudia. The Damodar river touches this subdivision on the southern side. Most of the rivers dry up more or less completely during the winter months and the hot season.

The Grand Trunk Road passes through this subdivision. The area of the south is well served by roads as well as railways. The northern half which has the hills is not so fortunate. Gomoh Junction on the Grand Chord line is situated near the western border is connected with Adra Junction in the Purulia district by another line of the Eastern Railway. The south-western portion of the subdivision is well served by the railways.

The soils of this subdivision are mixtures of clay, sand and gravel in varying proportions. Of the varieties in which clay predominates, *Gobra Chita* is the only one which yields crops. It is of a blackish colour, very hard when dry and impossible to plough unless softened by sufficient rain.

The *Dubhi Chita* is mixed with limestone nodules and the clay is impermeable. The *Dubhi Chita* or *Karna* can be used only as a source of lime.

There are plenty of *sisso* trees and bamboo in this subdivision mainly in Topchanchi police-station. There are also some sandal wood trees in the forests of the subdivision. Besides there are also trees of soft pulp which are useful for cottage industries and paper industry. Wild animals, namely, tigers, boars, etc., are found in the jungles of Topchanchi. Jungle birds are also found all over the subdivision.

The important places of this subdivision are Gomoh, Topchanchi, Chas and Chandankiary.

BALLIAPUR.—This is a large village in Sadar subdivision which is also the headquarters of a police-station and Block of the same name.

The village has a post office, a high, a middle school, upper and primary schools and a hospital. A metalled road runs from Gobindpur to Balliapur.

BARAMASIA.—This village is situated at a distance of 12 miles from Chandankiary police-station on the Chandankiary-Purulia road. It is under the jurisdiction of Chandankiary police-station.

There is a big market of vegetables, and agricultural produce in the village. There are health sub-centres, a veterinary dispensary and a Dak Bungalow in the villages.

BHAGA.—A township in Sadar subdivision is situated at a distance of two miles south from Jharia. This is also a satellite town of Dhanbad. It is connected with Jharia by metalled road. There is a mining school here which is run by the State Government.

There are a sub-post office and a rest-house. It is electrified and there are four flour mills here.

BHOJUDIH.—This village about 15 miles from Dhanbad is important for its colliery and as an export centre of coal. There is a railway station of South-Eastern Railway in this village.

Coal is generally exported from the railway station here to South India. There is a big market in this village. The village has a post office, a high school, a middle school and upper and primary schools.

BHOWRAH.—It has been treated as a town in 1961 census. The total population according to the census of 1961 is 10,587, i.e., 6,574 males and 4,013 females.

This town is situated on the bank of river the Damodar. There is a colliery in the town. There are a high school, a middle school and a primary school in the town.

CHAITUDIH.—It has been treated as a town in 1961 census with a total population of 6,551, i.e., 4,434 males and 2,117 females. It is under the jurisdiction of Katras police-station of Baghmara subdivision. There is a flag station of South-Eastern Railway. An unmetalled road connects Chaitudih with Katras. There are a public library and a lower and an upper primary schools. There is a big market.

CHANCH.—A suburban village in Sadar subdivision under the jurisdiction of Chirkunda police-station, is situated at a distance of 3 miles from Kumardhubi on the Dhanbad-Panchet road. The village has an area of 372.16 acres, 674 occupied houses with 2,884 souls, i.e., 732 males and 1,152 females according to 1951 census.

The village is important because of Reliance Firebricks Factory, Ltd., established in 1910 in the village.

As regards medical facilities one Employment State Insurance Dispensary sponsored by Bihar Government has been started in the village in 1959. There are one doctor, three compounders and four dressers in the dispensary. Besides, a ten-bedded hospital is also running on behalf of the factory.

One labour welfare centre has been started by State Government in 1959 in the village which has an attached library with 500 books.

There is only one middle school established in 1951 with 504 students and 12 teachers. The village has a post office established in 1949.

On behalf of the factories 200 houses have been constructed during the years 1960-61 for the employees of the factory. Besides, a canteen, a creche and one recreation club are functioning in the village. A *hatia* is held on every 10th and 25th day of the month. There is no permanent market in the village and the villagers have to go to either Kumardhubi or Chirkunda for purchasing commodities. The village is electrified.

CHANDANKIARY.—This village is the headquarters of Community Development Block and police-station of the same name. It is at a distance of 14 miles from Chas on Dhanbad-Chas-Purulia National Highway. Prior to 1956, it was under the jurisdiction of Manbhum district but after the creation of the new district it remained in Bihar.

The main produce of the locality is paddy. There are a number of educated families in the village.

CHAS.—A village in Baghmara subdivision situated at a distance of about 28 miles from Dhanbad town. The village has a police-station of the same name. Prior to 1956, Chas thana was under the jurisdiction of Purulia subdivision of Manbhum district. According to the Transfer of Territories Act, 1956, this thana was transferred to Dhanbad which was formed into a separate district in October, 1956.

This village is the headquarters of a Block of the same name. The main produce of the village is paddy, gram and potato. The villagers send their produce to Dhanbad town, Jharia and Gomoh, etc. There are three large tanks in the village. There are also two old temples in the village where the villagers daily congregate to worship.

So far as communication is concerned this village is situated on the junction of two important roads, namely, Dhanbad-Ranchi Road and Dhanbad-Purulia Road. The Ahalyabai Road passes through this road which is extended up to Calcutta.

As regards medical facilities, the District Board has opened a Maternity and Child Welfare Centre in the village. There is a State dispensary attached to the Block.

There are a high school, a middle school and lower primary schools in this village. The incidence of literacy is large.

The village has a post office, a *Gram Panchayat*, a Dak Bungalow and a forest rest house.

The villagers perform Durga *puja*, Rath *mela* festival and Lakshmi *puja* festival every year. People from the neighbouring villages also come to see the performances of this village.

CHIRKUNDA.—It has been treated as a town in 1961 census. It is at a distance of about 18 miles from Dhanbad town. The total population according to the census of 1961 is 9,477 persons (males 5,446 and females 4,031).

Chirkunda police-station is at the border of Bengal and Bihar. There is an excise check-post here. There are a high school, a middle school, lower and upper primary schools in the town. There are flour mills in the town. Chirkunda is a growing township and has a good market. There is a very heavy vehicular traffic on the Grand Trunk Road at Bengal-Bihar border. Has collieries.

DAMODAR VALLEY CORPORATION*.—The river Damodar rises in the Khamarpet Hill in the Palamau district. It is 336 miles long and flows through the districts of Palamau, Ranchi, Hazaribagh, Santhal Parganas and Dhanbad in Bihar and the districts of Burdwan, Bankura, Hooghly and Howrah in West Bengal. Before meeting the river Hooghly some 30 miles below Calcutta, it assumes a deltaic character and starts throwing off distributaries. The principal tributaries are the Maulah, Saphi, Hahmo, Bokaro, Konar, Jamunia, Gowai, Ijri and Barakar.

The Damodar is a monsoon-fed seasonal river and as such it has many problems peculiar to itself. It is subject to sudden devastating floods in the lower valley when fed with rain, but during the dry months the river has very little water and in the upper reaches none

* Some of the schemes of D. V. C. are outside Dhanbad district. The subject-matter has to be treated as a whole and hence it is given here. (P.C.R.C.)

at all. The hills of the Upper Valley have been denuded of their vegetation due to thoughtless felling of trees, overgrazing and over-cropping. This has led to the countryside being badly eroded. The rich top soil of this fertile region is thus washed away periodically by the Damodar.

The Valley, however, is the most highly developed belt in the country, industrially, since most of the minerals are located here. There is, however, a greater scope for expansion with a regular source of water and an assured supply of cheap power.

Plans to control the river have been under discussion for a very long time. In fact certain embankments in its lower reaches are said to have existed since the middle of the 18th century. The maintenance of these embankments which were frequently breached by floods constituted a major problem for the existing Government. Ultimately a decision was arrived at after the disastrous flood of July, 1943. A Flood Enquiry Committee was appointed which recommended the construction of a series of reservoirs along the Damodar and its tributaries to control the river. It further suggested that they be multipurpose along the lines of the Tennessee Valley Project in the United States to develop the valley as a whole. This suggestion was examined by the Central Technical Power Board, and in August, 1945, was considered and adopted at a joint meeting of the representatives of the Central Government and the State Governments of Bihar and Bengal. In March, 1948, the Damodar Valley Corporation Act was framed by the Central Legislature and on the 7th July 1948, the Corporation became an established fact. The Damodar Valley Corporation is an autonomous regional organization consisting of the Central Government and the State Government of Bengal and Bihar.

This is the first Multipurpose River Valley Development Project on a comprehensive scale to be taken up in India. The nature of this undertaking is clear from the functions of the Corporation as defined in section 12 of the Damodar Valley Corporation Act.

"The function of the Corporation shall be—

- (a) The promotion and operation of schemes for irrigation, water-supply and drainage.
- (b) The promotion and operation of schemes for the generation, transmission and distributaries of electrical energy, both hydro-electric and thermal.
- (c) The promotion and operation of schemes for flood control in the Damodar River and its tributaries and the channels, if any, excavated by the Corporation in connection with the scheme for the improvement of flow conditions in the Hooghly river.
- (d) The promotion and control of irrigation in the Damodar river and its tributaries and channels, if any.

- (e) The promotion of afforestation and control of soil erosion in the Damodar Valley.
- (f) The promotion of Public Health and the general well-being in the Damodar Valley and its area of operation."

The work was divided into two phases. In the first phase we have (1) four dams at Tilaiya, Konar, Maithon and Panchet Hill with Hydro-electric Power Stations attached to each. The controlled release of water will be utilised for irrigation in the Lower Valley. The four dams together have been designed to hold back the highest recorded flood of 650,000 cusecs.

(2) An irrigation barrage with 1,550 miles of canals and distributaries, for irrigation of which 85 miles taking off from the left bank will be navigable as well.

(3) A Thermal Power Station at Bokaro with an ultimate capacity of 225,000 K.W.

(4) A grid of over 800 route miles of transmission lines with a number of sub-stations and receiving stations.

(5) Soil Conservation.

Tilaiya built on the Barakar 130 miles above its confluence with the Damodar was the first of the four dams to be completed and was opened on the 21st February, 1953. This dam is in Hazaribagh district.

The all-concrete dam some 1,200 feet long and 99 ft. high holds back a reservoir of 23 square miles in area. The attached Hydro-electric Power House has an installed capacity of 4,000 K.W. of Power. A portion of the old Kodarma Road having been submerged, a 7-mile road with a bridge 550 ft. long was constructed by the D.V.C. as a link to the Patna-Ranchi Highway—another 320 ft. long bridge over the Karanjia river—Ranchi-Patna Diversion Road has also been constructed.

Konar dam is situated on the Konar river 23 miles above its confluence with the Damodar. The dam completed in October, 1955, is a composite structure with the concrete gravity type spillway section on the river bed flanked by a long earthen embankment on the left bank and a short one on the right. There is also a saddle dyke. The total overall length of the dam is 12,080 ft. and it is 160 ft. high. It is expected to provide water for irrigating 1,04,000 acres of land in the Lower Valley and will supply 400 cusecs of cooling water to the Bokaro Thermal Power Station. The attached Hydro-electric Power House will have a capacity of 40,000 K.W.

Maithon dam, in Dhanbad district is on the Barakar river about 5 miles above its confluence with the Damodar. It is a composite structure with the rolled earth dam on the river bed and the concrete

spillway section built on the diversion channel cut in the right bank. The Power House is underground in the left bank with a capacity of 60,000 K.W. It is the first one of its type to be constructed in India. There are long stretches of dykes on both banks and the total overall length of the dam is a little over three miles. It is 162 ft. high.

The controlled release of water from the dam is expected to irrigate 27,000 acres in the Lower Valley. Maithon dam will act as one of the major modulators of floods.*

Panchet Hill is the fourth dam and is the only one across the Damodar river itself in the first phase. It is also a composite structure with a concrete spillway section on the diversion channel cut in the left bank flanked by earthen embankments on both sides. The main earth dam is across the river bed. There are long stretches of dykes and the total over-all length of the dam is 22,155 ft. or nearly four and a quarter miles. It is 134 ft. high. The installed capacity of the Power House is 40,000 K.W. The dam has been designed primarily for flood-control. The water released from the dam will be utilised for irrigation.

Barrage and Irrigation.—The water discharged from the four dams will be diverted into a net work of canals and distributaries by the barrage on the Damodar at Durgapur in the district of Burdwan. There is provision for navigation as well. The project comprises of—

- (a) Headworks consisting of a barrage across the Damodar at Durgapur and head regulators over the canals on the right and left banks.
- (b) Main canals and distributaries on both banks, the principal one on the left bank being navigable and connecting the coal-mining areas around Raniganj with the Hooghly about 35 miles above Calcutta.
- (c) A drainage system composed of 442 miles of channels.

The barrage has been designed to supply water to 1,550 miles of canals which will irrigate 1,043,762 acres of land in the Lower Valley. The barrage was opened on August 9th, 1955.

Bokaro Thermal Power Station.—The Thermal Power Plant has been constructed to even out the seasonal fluctuations on the grid inevitably arising in the hydro-electric installations constructed on a river system dependent on the monsoon.

The Power House is situated on the bank of the Konar river just below its confluence with the Bokaro. It has at present an installed capacity of 150,000 K.W. consisting of 3 turbo-generators with a capacity of 50,000 K.W. each. There is provision for a fourth unit with a capacity of 75,000 K.W.

* Also see Maithon later in this text.

The plant uses low grade coal with approximately 30 per cent ash content and is designed on the unit system; each turbo-generator being supplied with steam from two boilers and having its own step up transformer. Each boiler has a capacity of 3,00,000 lbs. of steam per hour.

Cooling water necessary for the plant is supplied by the dam at Konar 12 miles upstream. Sufficient local storage has also been provided by a concrete barrage with lift-gates near the Power House. Bokaro and Konar are connected by a road built by the Damodar Valley Corporation.

Soil Conservation.—Soil and water conservation is an integral part of the Project. There is a twofold programme of reclamation of waste land and conservation of soil. The upper catchment area has been extensively surveyed in this connection and an experimental farm has been established at Deochanda to develop simple and practical methods of soil conservation. Several thousand acres of badly eroded land are being afforested. A few head-water dams have also been built to prevent soil erosion. These will supply the local areas with water for domestic purposes and irrigation as well. Extension in the resettlement areas to help and advise the local cultivators in better agricultural practices is also being done.

Power Transmission and Distribution System.—The network of the grid comprises 1,725 circuit miles of transmission and distribution lines, of different voltage and 35 sub-stations of various voltage and capacities—

- (a) 132,000 volt primary transmission (grid) lines—1,520 circuit miles.
- (b) 33,000 volt distribution lines.
- (c) 19 grid sub-stations located at Bokaro, Putki, Sindri, Maithon, Kalipahari, Burdwan, Durgapur, Belmuri, Howrah, Gola, Ramgarh, Jamshedpur, Mosabani, Kharagpur, Konar, Barhi, Gaya, Patna and Dalmianagar.
- (d) 16 receiving and distribution stations of 33,000 volts located at Sijua, Ganeshpur, Digwadih. A. C. Co. works at Sindri, Maithon Right Bank, Kulti Iron Works, Chittaranjan Locomotive Works, Hindustan Cable Works, Kumardhubi, Disergarh, Sibpur, Luchipur Collieries, Pandaveswar (Coalfields) and Indian Iron and Steel Co. (Hirapur), Durgapur and Tilaiya.

Malaria Control.—Most of the valley has been extensively surveyed and widespread Malaria Control Units have been established at all the projects with a Central Malaria Laboratory at Hazaribagh to fight the disease. The incidence of malaria is steadily going down.

Rehabilitation.—The four D.V.C. dams will together cause the submergence of 75,000 acres of land of which roughly two-fifths are arable. Ordinarily under the law of Land Acquisition, owners of the acquired property would have been paid compensation only in cash. The Corporation regarded itself as a Welfare Organization and tried to rehabilitate the displaced families by providing land for land and house for house, and additional amenities. The people, however, have been given a choice. The additional amenities given in the rehabilitation of villages are Community Centres, temples, parks for children, good roads, drinking water wells and schools.

Development.—A modest programme of development has been taken up by the Corporation at the moment. This includes small scale industries such as—

- (a) A Central Finishing Workshop for hand forged items set up at Maithon.
- (b) Lock manufacturing industry at Tilaiya.
- (c) Cold storage industry.
- (d) Fibre industry.
- (e) Irrigation pumping service, etc.

Other schemes on this line are still under consideration.

The development of fisheries is being taken up seriously in all the reservoirs for commercial purposes under the expert guidance of the Zoological Survey of India and the Central Inland Fisheries Research Station, Calcutta.

Recreational facilities.—In view of the regular stream of visitors to the Valley, the D.V.C. has drawn up a scheme for providing necessary facilities to the tourists at all the dams particularly at Tilaiya and Maithon. The places will be provided with hotels, cottages, and parks with opportunities for camping arrangements, swimming, fishing and boating in the reservoirs. The face of the countryside will be changed considerably, with these beautiful holiday resorts, each one conveniently accessible both to the common mass and to the moneyed tourist.

DHANBAD SADAR SUBDIVISION.—This was known as Gobindpur subdivision till July, 1908 with headquarters at Bagsuma village which was later transferred to Gobindpur and then to Dhanbad. This subdivision was a part of Manbhum district and continued as such till the status was raised to that of a sub-district in 1921. In 1956, it became a full-fledged district when Chas and Chandankiary areas came over to Dhanbad sub-district and the rest of Manbhum district went over to Bengal as a result of the recommendations of the State Reorganisations Commission.

Dhanbad is the headquarter subdivision of the same name. The population of the subdivision was 2,77,122 in 1901 as compared with 2,21,434 in 1891, the density being 345 persons to the square mile.

The subdivision previously comprised of the present Baghmara subdivision also. According to the provisional population figures of 1961 census the total population of the subdivision is 7,41,604 persons.

Regarding this subdivision, the *District Gazetteer of Manbhum* published in 1911 mentions that, "Known till July, 1908 as the Gobindpur subdivision, is the northern subdivision of the district lying between 23°38' and 24°4' north and 86°7' and 86°50' east with an area of 803 square miles. In shape it is an irregular triangle between the Barakhar and Damodar rivers, their junction just south of Barakhar in the Burdwan district forming the apex. A third river, the Jamuni, forms a part of its western boundary, the remainder being formed by the lower slopes of the Parasnath Range, and the various spurs and ridges which strike off from it. To the north and east the country is fairly open, marked only by occasional hills of no great height. The population of the subdivision was 2,77,122 in 1901 as compared with 2,21,434 in 1891, the density being 345 persons to the square mile. The south-eastern part of the subdivision, comprising the police-stations of Dhanbad and Jharia and the independent outpost of Katras, constitutes the Jharia coalfield, the rapid development of which between the years 1894 and 1901 accounts for the large increase in the population of the subdivision as returned in the latter year; during the succeeding years the development has been even more marked, and there were in 1908 no less than 281 collieries at work in this area employing a daily average of 72,000 labourers. A portion of the Raniganj coalfield falls within the eastern part of the subdivision (police-station Nirsa and independent outpost Chirkunda). The area covered by the remaining police-stations of Gobindpur, Tundi and Topchanchi and outpost Rajganj is almost entirely outside the limits of workable coal deposits, and is consequently purely rural in character. There are no towns, but Jharia Khas, Katras and Dhanbad are now places of considerable size and importance. The headquarters of the subdivision were moved to Dhanbad from Gobindpur in July, 1908; for some years before 1846, Bagsuma, a small village at mile 167 of the Grand Trunk Road, was the site of the Subdivisional Officer's residence and office."

At present (1962) this subdivision has 15 towns, namely, Dhanbad, Jharia, Sindri, Tisra, Jorapokhar, Bhowrah, Jamadoba, Loyabad, Sijua, Kerkend, Dumarkunda, Maithon, Panchet, Kumardhubi and Chirkunda. Dhanbad has municipality. Jharia area local affairs are controlled by Jharia Mines Board of Health. There is a Notified Area Committee at Sindri.

For administrative purposes the subdivision is divided into eleven thanas, namely, Dhanbad, Kenduadih, Jogta, Gobindpur, Tundi, Nirsa, Chirkunda, Sindri, Jharia, Jorapokhar and Balliapur. The Chief Executive and Revenue Officer is the Subdivisional Officer who is assisted by other Magistrates and Block Development Officers.

The work of the Land Reforms Department is in charge of a Deputy Collector in charge of Land Reforms who is assisted by seven Block Development Officers, Circle Inspectors and *Kramcharkis*. The Community Development Blocks are located at Dhanbad, Gobindpur, Tundi, Balliapur, Chirkunda, Nirsa and Jharia.

The subdivision is well served with road communications and postal facilities. There are telegraph offices at Dhanbad, Jharia, Sindri, Gobindpur, etc. There are two Telephone Exchanges at Dhanbad and Jharia.

This subdivision has an attractive landscape. The northern part, i.e., Tundi, Gobindpur and Chirkunda area has forests and hills. The southern part of the subdivision, i.e., Jharia, Loyabad, Lodna, etc., is full of coalfields. The subdivision is well served with educational institutions of various types.

Some religious fairs and *melas* are held at Dhanbad, Gobindpur, Sindri, Balliapur, etc., on the occasion of *Kartik Purnamasi*, *Durga Puja*, *Saraswati Puja* and *Id*.

The original inhabitants of this subdivision are Santhals, Oraons and Bengalis. The areas of Gobindpur, Tundi, Chirkunda and Balliapur are mostly populated with tribal people, namely, Santhals and Oraons. Now the subdivision and Dhanbad town have a population hailing from almost all parts of India. The commercial and colliery interests and the various Government institutions have attracted them.

DHANBAD TOWN.—It is the headquarters of the district and the Sadar subdivision. The population of the town since 1921 to 1961 is given below:—

Year.		Persons.	Males.	Females.
1921	..	12,951	8,068	4,883
1931	..	16,356	9,882	6,474
1941	..	21,411	12,958	8,453
1951	..	34,077	20,661	13,416
1961	..	57,352	34,944	22,408

The *District Gazetteer of Manbhum* (1911) by H. Coupland mentions:—"Headquarters of the subdivision of that name since July, 1908. It is an important station on the East Indian Grand Chord Line, and is the junction for the Jharia and Katras branches from which radiate most of the short lengths of line which serve the various collieries. The railway quarters cover a considerable area on either side of the line near the station, and quarters have been erected or are in course of erection for a full complement of railway officials besides a very large subordinate staff, both European and Indian. The civil buildings constructed between 1905 and 1908 lie in the village of Hirapur about half a mile from the railway station and

comprise a Subdivisional Magistrate's Court, a Munsifi, Sub-Registry Office, Post and Telegraph Office combined, and police-station, with residences for the Subdivisional Officer, Munsif, and Sub-Deputy Magistrate. North of these again is the large double-storied office of the Department of Mines in India, with residences for the Chief Inspector, an Inspector and a large number of clerks. The purely native town which is still in the early stages of growth consists of a considerable bazar in the village of Dhanbaid immediately south of the Railway line and rapidly growing residential quarter for pleaders, clerks, etc., between the offices of the Mines Department and the rural village of Hirapur. The chief feature of the former is the Lindsay market-place recently constructed by private enterprise. There are also several large general merchandise shops and a couple of printing presses."*

There have been fundamental changes since. The town has become the sub-district headquarters of the Dhanbad Sadar subdivision. It is also the headquarters of the Dhanbad district since 1956.

The town has a municipality established in 1919. The limits of the municipality extend over an area of eight square miles. A detailed description of the municipality will be found in the Chapter on 'Local Self-Government'.

The town is in the most important colliery zone and close to Grand Trunk Road, an inter-state road of strategic and commercial importance. The town has a large number of offices of both Central and State Governments. These offices have been covered elsewhere.

Dhanbad is a very important trade centre of the State and has excellent railway and road services. The railway junction station of same name is always extremely busy. Besides being the main centre of coal export, there is a large turnover of machines, medicine, cigarettes, grains and consumers' goods in the town. A detailed description of the Banking, Trade and Commerce will be found in the Chapter on 'Banking, Trade and Commerce' and 'Communications'.

A large number of roads connecting Dhanbad with other districts of the State and other States take off from Dhanbad. Transport of goods by the roadways is enormously increasing. From Dhanbad town there are passenger bus services and carrier truck services to Ranchi, Patna, Bhagalpur, Deoghar, Dumka, Asansol, Purulia, Raniganj, Calcutta, Delhi, etc.

There are a number of high schools and colleges and other technical institutions. They have been covered in the text on Education and Culture. Good medical facilities exist which have been dwelt on separately.

There are recreational facilities like cinemas, playgrounds and clubs. The town has expanded enormously in the last one decade.

*"Dhanbaid" at pages 270-271 of the *District Gazetteer of Manbhum* by H. Coupland, 1911.

It is the feeder centre for a number of satellite urban areas like Jharia, Katras, Sindri, etc. There has been a lop-sided growth as there are no regular town-planning schemes. In the recent years the railway station has been given an attractive building and a large number of Government offices and quarters have been built. The growth of the number of private houses is also very remarkable.

The town has a cross-section of population in various avocation and from almost all parts of India and abroad.

The facilities for temporary accommodation to tourists and other casual visitors are very poor. The Circuit House, the Inspection Bungalow and the Dak Bungalow are mainly meant for touring Government officials. There are very few hotels of good standard although a number of hotels of very poor standard make a good business. The three *Dharamshalas* and the Railway waiting room are always overcrowded. The collieries, various technical institutions and Research Centres of high standard, the attractive neighbourhood and the landscapes, the facilities to visit Ranchi, Purulia, etc., from here indicate a good potential for development of tourism. But the facilities of accommodation for the average tourist are extremely inadequate and thwart tourism.

DUMARKUNDA.—A colliery town with a total population according to the census of 1961 of 8,670 persons, i.e., 5,430 males and 3,240 females.

An *unmetalled* road runs from this town to the Grand Trunk Road. The town has a post office, a middle and an upper primary school.

GOBINDPUR.—The *District Gazetteer of Manbhum* (1911) by H. Coupland has the following description:—

"A village situated in 23°50' N. and 86°32'E. at the 169th mile of the Grand Trunk Road, formerly (till 1908) the headquarters of the northern subdivision of the district. Population (1901) 1,293. There were the usual subdivisional offices and a residence and a sub-jail. The last named has now been converted into a guru-training school, and the Subdivisional Officer's residence has been taken over by the District Board for use as an Inspection Bungalow. The village has now lost practically all its importance with the removal of the pleaders, mukhtears, clerks and most of the shopkeepers to Dhanbaid. A weekly market is held, which is attended by a considerable number of villagers from the rural areas surrounding. A single lac factory, and a few big grain merchants' depots remain to testify to the former importance of the place. There are two fine sheets of water, *bandhs* constructed at the expense of Government during the famine years of 1866 and by public subscription in 1882-83, known respectively as the Sahib *bandh* and the Risley *bandh*. Both of these are maintained by the District Board. There is also a Government camping ground to the west of the village, and a Public Works Department Inspection

Bungalow about three miles west on the Grand Trunk Road at Kandra. Good gravelled roads to Tundi and Pokhuria (towards Giridih and Jamtara, respectively) take off from the Grand Trunk Road on the northern side, and on the south there is the direct road to Purulia *via* Pradhankhuntha Station and Sarsakunri Ghat, and also a metalled road to Dhanbaid and the coalfield."

Gobindpur has got back some of her old importance owing to the siting of a number of Government offices and development of road-traffic on Grand Trunk Road. The population of Gobindpur in 1951 census was 1,163. The 1961 census figure is not available.

There is a big market of vegetables, cloths, grains, etc. The village *hat* is held twice a week, i.e., Tuesday and Friday. There are a college, a high school, lower and upper primary schools, one middle school, and a teachers' training school in the village. The camping ground of 1911 A.D. has become the permanent residence of Bihar Military Police. There are a post office, a block office, a police-station, one State dispensary, one leprosy centre and one military dispensary at Gobindpur. The village is electrified and there are about four flour mills in the village.

GOMOH.—It has been treated as town in the census of 1961. According to 1961 census, its total population is 12,097, i.e., 6,873 males and 5,224 females. It is under the jurisdiction of Baghmara subdivision.

This is a big railway junction of the Eastern Railway of the same name. The railway has established here lower and upper primary schools and a cinema house. The town is electrified and there are a high school, and several lower, upper, primary and middle schools in the town. There is also a loco shed of Eastern Railway here. The town has become important due to some industries and coal-mines. The famous Topchanchi lake is about four miles from here.

Gomoh is well connected by roads with Dhanbad and Purulia. There is an old Roman Catholic Mission at Gomoh. A number of persons have settled down here after retirement. Gomoh and the neighbourhood have a picturesque landscape and the town has potential of expansion.

JAMADOBA.—It has been treated as town in 1961 census. The total population according to the census of 1961 is 6,568 persons, i.e., 4,047 males and 2,521 females.

This town has an important colliery of the Tata Iron and Steel Company. There is a Coal Washery Plant in the town. The coal from different collieries of TISCO is collected in the washery plant for necessary treatment.

The town has a post office, a *Gram Panchayat*, a high school, a middle and lower primary schools. There is a big market in the town.

JHARIA.—The *District Gazetteer of Manbhum* (1911) written by H. Coupland mentions as follows:—

"A large village in the Dhanbaid subdivision, situated in 23°44' north and 86°27' east. Population (1901) 4,623. The village itself, except in point of size, possesses few features of interest; it contains a market place, built by the local Raja, a charitable dispensary built and maintained by him, and a police-station. There are a number of shops of considerable size dealing grain, cloth, kerosene oil and other necessities of the large coalfield population; there are also residences, some of imposing dimensions, of Indian colliery owners, managers and others connected with the coal trade. Good metalled roads connect the station, the market, the Rajbari, etc., with the main District Board roads running from Dhanbaid, Katras and Pathardih. The residence of the Raja, just outside of and to the north-west of the bazar, is of considerable size; most of it is of comparatively modern construction and of no special architectural interest; a large house for the reception of guests is under construction. Between the Rajbari and bazar is a fine tank, and another large tank, the Rani bandh, recently enlarged and deepened at the Raja's expense lies between the Dhanbaid and Katras roads and the Damodar Branch of the East Indian Railway line. On all sides of the bazar, and working right up to if not actually underneath part of it, are numerous collieries some of the best and most easily worked of the Jharia seams underlie the town, which, sooner or later, will probably have to make room for collieries. A quarter of a mile from the present residence of the Raja is a small hill or mound with a few dilapidated ruins on it, said to be the remains of the original fort of Jhariagarh, from which, according to the historians, the whole tract of country including the greater part of Chotanagpur and part of Bihar got the name of Jharkhand, by which it was known in Muhammadan times. The mound also contains traces of having been a Bhumij or Munda burial ground. According to tradition the present Jharia house is an offshoot of Palganj in Hazaribagh and was formerly established at Katrasgarh, the original offshoot having further split up in more recent times into the three houses of Katras, Nawagarh, and Jharia. Twenty years ago, the zamindar's income was some Rs. 25,000 to Rs. 30,000 entirely derived from rents of land; his present income from rents and mining royalties is some three to five lakhs per annum, over and above which very large sums have been received as '*salami*' on coal settlements.

"Half way between Jharia (East Indian Railway) and Bhaga (Bengal-Nagpur Railway) Railway Stations is the Jharia Station Club, which is the common meeting place of the European community of the coalfield; nearer Bhaga Station is a District Board Inspection Bungalow, and also a small lecture-hall where the Mining Instructor gives regular courses of instruction to candidates for Mines Managers' certificates. On the other side of Jharia about half a mile from the town on the Dhanbaid road is a Protestant (undenominational) Church recently erected by private subscription."

Jharia has now become a very important colliery centre and has extensive commerce. It is really a satellite town of Dhanbad having expanded enormously. The population of the town is given below:—

Year.		Persons.	Males.	Females.
1941	..	18,037	10,717	7,320
1951	..	26,480	15,689	10,791
1961	..	33,683	19,676	14,007

The population has increased by about fifteen thousands in 1961 census as against 1941 census. Jharia is the centre of coalfield area. There are big colliery merchants in the town. The town is the headquarters of a block office, a police-station and a post office. There are a good number of colliery factories and commercial offices in the town.

There are a college, five high schools including one girls' school and lower and primary schools in the town. There are two cinema houses in the town and the students are the best patrons of the pictures. The sanitation work of the town is done by the Jharia Mines Board of Health. The water is supplied to the town by the Jharia Water Board. The Board has constructed about 60 free stand-posts in the town for the benefit of public. There is one State dispensary and many dispensaries run by the collieries in the town.

Jharia is well served by rail and roads. A large number of buses, taxis and trucks are on the move throughout the day and night. There is a railway station of the Eastern Railway also but usually people get down at Dhanbad Railway Station and go to Jharia by vehicles.

JORAPOKHAR.—It is a small town in Sadar subdivision with a police-station of the same name. The total population according to the census of 1961 is 15,595, i.e., 9,765 males and 5,830 females.

The town has a post office, a middle school, an upper and lower primary schools. There is statutory *Gram Panchayat* in the town. The town has a good market where commodities of daily use are sold.

KATRAS OR KATRASGARH.—The *District Gazetteer of Manbhum* published in 1911 mentions as follows:—

"A village of considerable size about 1½ miles from the railway station of that name, and six miles south of the police outpost Rajganj on the Grand Trunk Road. Along with the new bazar which has sprung up near the station and is locally called Panchgarhi it is now a place of considerable importance being surrounded on three sides by colliery areas. Panchgarhi contains an independent police outpost, an Inspection Bungalow, post and telegraph office combined, school, and a large market place which is the chief centre of distribution in the western half of the Jharia coalfield. The village of Katras

itself contains the residence of the local zamindar, and according to tradition was formerly the headquarters of the Jharia Raj before this was split up into the separate houses of Katras, Jharia and Nawagarh. There are traces of ruins of numerous temples and other building, of which a small temple half ruined, known as the Dewal is described by Mr. Beglar as an interesting and ancient example of the single cell type. It stands on the crest of high undulating ground known by the name of Jhinjhi Pahari, where a fair is held in the month of Chitra (March-April). The temple faces west; on the architrave of the entrance is a sculptured human head with matted locks, apparently intended for Siva, and within is an argha centrically placed. South of Katras about eight miles off on both banks of the Damodar river at Chechgaongarh and Belonja are a number of ruined temples, marking the site of a very ancient Buddhist or Jain religious establishment, succeeded by a Brahmanical. The ruins, for the most part very dilapidated, are principally of Saivic temple but indications of the earlier Jain establishment remain in large naked and obviously Jain statue now at Belonja, south of the river, besides various Jain and Buddhistic figures and emblems sculptured on the fragments in situ or scattered about. The ruins are very extensive, traces of 16 temples, large and small, are extent in a space of about a quarter of a mile broad and half a mile in length, besides others, half a mile away on either side on the north bank of the river and of one large temple on the south bank, and there is every indication that the buildings were elaborate and profusely ornamented with sculpture, some of which in beauty and delicacy of workmanship views, according to Mr. Beglar, with the similar work in the superb temple of Udaipur in Central India."

According to the Census of 1951 its total population was 3,960, i.e., 2,235 males and 1,725 females with 753 occupied houses. It has an area of 753.70 acres. It has been treated as town from 1961 census. The total population of it is 17,224, i.e., 9,784 males and 7,440 females.

This town is about 12 miles from Dhanbad. It has a police-station of the same name. There are a high school, a middle school, upper and lower primary schools, a *Gram Panchayat* and a library. It is an important centre of coal-mining industries adjacent to Jharia coalfields.

Katras is also a satellite town of Dhanbad.

KERKEND.—This town is situated at a distance of about five miles from Dhanbad. It is a business centre for cloth and foodgrains. There is a railway station at a distance of half a mile from the main bazar. The bazar area is electrified.

There are lower, upper and middle schools in this town. There are also flour mills in this town.

According to the census of 1961 its population is 6,498, i.e., 3,989 males and 2,509 females.

KUMARDHUBI.—Kumardhubi on the Grand Trunk Road is at a distance of 27 miles from Dhanbad town and about thirteen miles from Asansol. The town has a railway station of Eastern Railway of the same name. It has an area of 194.53* acres and according to the Census of 1961 the total population is 16,542, i.e., 9,825 males and 6,717 females.†

There are four big industrial concerns in this town, namely, Kumardhubi Fireclay and Silica Works, Ltd., Eagle Rolling Mills, Ltd., Kumardhubi Engineering Works, Ltd., and McNally Bird Engineering Company, Ltd. The McNally Bird Engineering Company, Ltd., is under construction (1963) and is expected to go under production in 1964-65. At present (1963), there are about 8,000 workers engaged in the four concerns. The details have been given in the Chapter on 'Industries'.

Education.—The town has a primary school, a Bengali middle school, a Hindi middle school and a high school.

A brief description of the schools is as follows:—

Bengali Middle School.—It was started in 1945. It has 600 students on the roll, i.e., 400 boys and 200 girls and six teachers including two lady teachers. It has a library consisting of 600 books. The medium of instruction is both Bengali and Hindi. The school building has been donated by Bird and Company.

A private Bengali Girls' High School is also running in the building of the middle school. In 1963, eight girl students of this school appeared at the Secondary School Examination, Bihar.

Hindi Middle School.—It was started in 1950. It has 400 students, i.e., 350 boys and 50 girls and four teachers. It has a library consisting of 200 books. This school receives grant-in-aid from State Government. This school is managed by Bird and Company.

Kumardhubi High School.—It was started in 1961. It has about 600 students both boys and girls. There are fourteen teachers in the school. It has a library consisting of 1,000 books.

There is no college in the town. There are about 100 students including girl students of this town reading in the colleges in Asansol (West Bengal).

Hospital and medical facilities.—The Kumardhubi Hospital with 57 beds and a staff of doctors, nurses, etc., is maintained by Bird and Company and is meant for the employees of the company as well as for the general public. There is also an Employees' State Insurance Dispensary in which there are eight doctors, three nurses, six compounders and six dressers to look after the health of workers. The E. S. I. Dispensary has also arrangement for ten beds in Kumardhubi

* District Census Handbook of Dhanbad, 1961, p. 174.

† Census of India (1961), p. 175, final population totals.

Hospital. The average daily patients at the dispensary are 100. The **Employees' State Insurance Dispensary** is meant for employees of the factories only. The dispensary is run by the contribution made by the Central and State Governments and workers of the factories.

According to the **Employees' State Insurance Act, 1948**, the following five benefits are given to the workers of the factories of the town:—

- (1) Sickness benefit, (2) Maternity benefit, (3) Disablement benefit, (4) Dependents' benefit, and (5) Medical benefit.

Sanitation.—Bird and Company looks after the sanitation of Company areas only and the Jharia Mines Board of Health looks after the other areas of the town. Bird and Company has employed about 200 sweepers, scavengers, and Sanitary Inspectors for looking after the sanitation of the factory quarters and factory area. The area of the town which does not belong to the Company is very congested, dirty with narrow lanes and very little of proper sanitation facilities.

Housing.—There are 2,000 houses of various types for the employees. The houses have sanitary fittings. The Industries Department has also constructed about 500 houses for the workers.

Non-Company area.—Due to growth of industry and population the housing problem has become acute in the town and the rent has gone up. At the time of investigation it was found that a 3 room house was rented at Rs. 100.

Transport and Communication.—There is a large number of rickshaws and *tangas* which are easily available when needed at reasonable rates. There is neither licensing system nor any fixed schedule of rates. The State of Bihar runs a transport service from Maithon to Deoghar and Bhagalpur *via* Kumardhubi town. The number of privately owned cars in the town is also large. A large number of taxis and private buses pass through this town. Kumardhubi being on Grand Trunk Road, is well connected to Maithon, Asansol on one side and Delhi and the Punjab on the other side.

Amusements.—There are four recreation clubs, viz., Kumardhubi Club, Bani Mandir Club, Evening Club and Labour Welfare Centre.

Kumardhubi Club.—It was established in 1917. This is one of the oldest clubs of the town. There are 105 members of the club. This club is meant for officers only. There is a library with 500 English books. There is also a swimming pool in the club campus; and indoor game facilities are also available. The membership fee is Rs. 6 per month.

Bani Mandir Club.—It was established in 1925. There are about 300 members in the club. Indoor game facilities are available in the club. It has a library with 300 books. The membership fee is annas eight per month.

Evening Club.—It was established in 1930. There are 250 members in the club. It has a library with 320 books.

Labour Welfare Centre.—It was established in 1957 by Bihar Government. Recreational games and reading facilities are provided to the workers and their dependents. Instruction in sewing, knitting, embroidery and fine arts is also given. The Centre has also got a film projector and a propaganda-cum-health van.

Libraries.—There are two public libraries in the town, namely, Bihar Pustakalaya and Kashanai-Adab Library.

The Bihar Pustakalaya was established in 1950. There are 150 members in the library and it has 1,600 books. The average daily visitors are about five.

The Kashanai-Adab Library was established in 1953. There are 2,500 books and 200 members in the library. The average number of daily visitors is ten.

Places of public worship and burial grounds.—There are about ten temples, three mosques, one church and separate burial ground for Muslims and Christians and the Hindus go to the Barakar river for cremation purposes.

Water-supply and lighting arrangement.—There is a scarcity of water in the town. The town people, except factory workers, drink well water. There is a Buriha Khad tank from where water is supplied by the Company to the quarters and bungalows of the factories free of charge. The lighting arrangement is also done by the factories free of charge. The Jharia Mines Board of Health sells electricity to the non-Company area.

Commodity supply sources.—There are about 15 wholesale dealers and 40 retailers in the town that sell the usual requirements. There are also a number of shops selling *pan*, cigarettes, etc.

A *hat* is held twice on Tuesday and Sunday. The *hat* is attended by about 200 traders. On the average about 10,000 persons visit the *hat*. Vegetables, fish and fruits are brought from Asansol and other adjoining villages.

Union.—There is a Workers' Union in Kumardhubi town. It was established in 1950. There are 5,000 members of the Union. The registration charge of the Union is Re. 1 and subscription per member is 25 nP. per month. This Union is affiliated to Indian National Trade Union Congress.

Liquor shop.—There is a foreign liquor shop in the town. But the common people of the town generally prefer country liquor sold at Chirkunda.

LODNA.—There is a railway station of Eastern Railway here. This village is important for coal industries and other industries such as the Salimar tar factory.

The village is situated in the south-east corner of Jharia and south of Dhanbad. There is a daily market.

LOYABAD.—It is a town in Sadar subdivision at a distance of about 19 miles from Dhanbad. The total population according to the census of 1961 is 11,553, i.e., 7,919 males and 3,634 females.

There are a post office, a middle school and upper and lower primary schools. The town is important for collieries. There is a large power house which supplies electricity to the coalfield areas. The electric power house is controlled by Bird and Company. There are about ten big collieries in the town area and the bulk of the population is associated with the collieries.

MAITHON TOWN.—Maithon is at a distance of 30 miles from Dhanbad town and two miles off the Grand Trunk Road. It is served by the Kumardhubi Railway Station on Grand Chord line (three miles) and by Barakar (five miles) on the main line. Asansol is 16 miles from Maithon. It has an area of about three square miles with 8,033 souls, i.e., 4,791 males and 3,242 females according to 1961 census.

The name Maithon is derived from *Mai-ki-than* (the mother's abode) and is associated with the old temple of Kalyaneshwari in Burdwan district in West Bengal, about two furlongs from the dam. During the Second Great War there was a military colony at Kalipahari village. The military cleared up the shrubs and raised a large number of military hutments. The present township of Maithon is located mostly on the site used by the military.

The town has grown out of the construction of Maithon dam and Hydel Power Station. Previously, there were scattered hamlets of the Bauris, Goalas, Suris and Santhals. The place was selected for constructing a dam in 1951 and in 1957, the Damodar Valley Corporation completed the construction of the dam here. A brief history of the dam is given below:—

The Damodar river rises in the Palamau hills at an approximate elevation of 2,000 ft. and moves in a generally south-easterly direction for a distance of nearly 180 miles through Bihar. On entering the plains of West Bengal it follows the same general course until it reaches the vicinity of Burdwan where it partly changes its course to a southerly direction and debouches into the river Hooghly some 30 miles below Calcutta. The general slope of the river in the first 150 miles of the course is approximately ten feet per mile. This flattens out in the next 100 miles to about three feet per mile and in the last 90 miles the general slope is less than one foot per mile. The river is approximately 336 miles in length and is fed by six tributaries of which number one is the Barakar.

Measures to control the river had been under discussion since the middle of the last century. The old records of the Bengal Government indicate the serious concern of that Government for the Damodar floods. The existing embankments on both the banks of the lower valley were frequently breached. Various palliative

measures used to be taken from time to time. In 1857 the right embankment for a distance of 20 miles was breached to relieve the last embankment. In 1889 a further length of ten miles of the right embankment was abandoned.

The flood control problem was undertaken after the disastrous flood in July, 1943. This flood interfered with the military movements when the Second War was at a critical stage so far as India was concerned. The Central Government decided that some permanent measure is necessary to control the ravages of Damodar river. Lord Wavell appointed Mr. W. L. Voorduin, an American Engineer, as the hydro-electric member of the Central Technical Power Board to study the problems of the Damodar and to make his recommendations. In August, 1944, Mr. Voorduin submitted his preliminary memorandum on the unified development of the Damodar river system.

This preliminary memorandum was considered at a number of inter-provincial conferences consisting of representatives of the Central, Bengal and Bihar Governments. The unified scheme was also examined by the four consultants appointed by the Government of India—Messrs. Ross Reigal and Fred Schlemmer, two top ranking engineers of United States, and Mr. A. N. Khosla and Mr. Narasimhaiya. The consultants broadly approved of the main technical features of the scheme and recommended the early initiation of construction work to begin with at Tilaiya, in Hazaribagh district which was followed by Maithon after one season.

Maithon Dam.—The dam is located on the Barakar river in Dhanbad district and is about eight miles above its confluence with the Damodar. It is a composite structure of concrete and earth dams. The river bed has an alluvial deposit of sand with a maximum depth of 70 feet above bed rock. This was one of the main reasons for building the earth dam on the river bed and the spillway structure on the right bank.

The lay-out includes a concrete gravity type spillway 618 feet long, abutment section of 379 feet 6 inches to the right and 175 feet 6 inches to the left of the spillway, a contiguous earth embankment approximately 2,160 feet long on the river bed, an earth dike 6,228 feet long on the right bank and three saddle dikes on the left bank of the river. The maximum height of the main earth dam is about 165 feet and that of concrete dam about 150 feet above diversion channel and 185 feet above the lowest foundation.

By the construction of the dam at Maithon, 1,588 houses and 26,176 acres of land were submerged. Out of 4,602 families in Dhanbad and Jamtara subdivisions (Santhal Parganas) only 650 families opted for "land for land". Accordingly, 1,951 acres of land were reclaimed by the Damodar Valley Corporation, out of which only 128 acres in Dhanbad district were finally accepted by 50 families. About 86 villages and 28,030 persons were affected. The

persons affected were rehabilitated at villages Deochanda and Panchmadhav in Hazaribagh district. The displaced persons were given compensation by D. V. C. About Rs. 185.05 lakhs were paid to the persons as compensation payable under Land Acquisition Act and Rs. 223.05 lakhs were spent on rehabilitation including cash compensation.

The average number of persons daily employed at the time of the construction of the dam by D. V. C. was 5,442 most of whom came from the local villages, Shahabad and Saran districts in Bihar and Ganjam district in Orissa. The work-site at Maithon was then a small township.

Safety measures to prevent accidents had also been adopted. Temporary structures, scaffoldings, centerings, ladders, etc., were regularly inspected every week by the officer incharge in order to ensure that they are safe and fit for use by workers. Use of safety belts, where necessary, was resorted to. Necessary precautionary railings and guards were provided at danger zones to cover the moving parts of machinery. Safety posters and caution notices were exhibited at conspicuous points and particularly at near danger zones. Flood lights were arranged during night shifts and first-aid measures were constantly kept in readiness.

There were a large number of hutments constructed with facilities for electricity, piped water and sanitary arrangements. A number of Nyssen huts left by the military were also used. A small hospital was sponsored. As a matter of fact, most of these hutments, bungalows and the hospital are still there as they were before.

Power Station.—The unique feature of the Maithon Power Station is that it is located underground in the left bank and is the first of its kind in India and second in Asia. The Power Station has a total generating capacity of 60,000 K.W. with 3 units of 20,000 K.W. each.

The Power Station vault is 234 feet 6 inches long, 45 feet 4 inches wide and 70 feet high. The access to the Power Station is provided through an access tunnel 700 feet long having a 12½ per cent grade. The three transformers are located in the transformer vault at the junction of access tunnel and generator vault at elevation level of 328 feet. The design of the Power Station was made by the Hazra Engineering Company of U. S. A.

Growth of Tourism.—The Maithon dam and its neighbourhood, the underground power house, the drive towards Chittaranjan by Kalyaneshwari temple are attractive features and attract visitors. The D. V. C. could probably have taken more interest to develop tourism. The facilities provided are, more or less, for the richer folks who have cars and arrange accommodation from before by contacting the D. V. C. headquarters. For the common men there are not many facilities and even permits to the Power Station are refused on the

ground that previous contact has not been made. The boating facilities provided by the D. V. C. at Maithon are expensive. The Yacht Club which has beautiful surroundings and attractive features is a private expensive club and meant for the members naturally. The accommodation provided by the D. V. C. in their bungalows is meagre and very expensive for the common man, the middle class and the students. If D. V. C. could have provided proper facilities for accommodation, transport and guide there could have been a tremendous development of tourism with Maithon as a centre and visits planned to the colliery and other mining areas, Kumardhubi, Chittaranjan, Durgapur and Shanti Niketan. There are no cheaper middle class hotels either run by the D. V. C. or for the public or private sector, no cheap transport and no planned tours. At Maithon itself the transport commonly available is a couple of rickshaws or some anti-diluvian *Ekkas* drawn by an emaciated pony. Taxis are available at Chirkunda about four miles away. The Public Relations Office gives only very routine information about the dam and the Power Station collected from the printed literature which are also not available to the average tourist. This office is not equipped with information with the past of Maithon. There is no stall with literature about D. V. C. at Maithon.

After the construction of the dam there does not appear to have been any attempt to develop the township. The area could have been utilised by encouraging buildings of planned houses by the private sector. The D. V. C. could have built houses for the private sector. There could have been proper market places, shopping centres, playgrounds, parks, recreation centres, etc. Maithon, as it is, hardly even caters to the creature comforts for the middle class tourists. The facilities though very small in nature or extent are for the D. V. C. employees only.

The survey of the attitude of the D. V. C. employees indicated some peculiar features. The small moribund clubs do not appear to be patronised by the very few high D. V. C. officials. A few uncomfortable chairs and deal-wood tables, an old radio, a few books and papers are their assets. The clubs are threatened with charges for the furniture and electricity. The previous football ground is now used for the construction of the school house. The prices of fish and meat have gone up by 25 per cent within the last few months (March, 1963). There is a Fishery Department of the D. V. C. at Maithon. The houses are scattered, spreading and mostly temporary hutments raised in the construction days. The offices are at different areas. The Engineering Office is at a distance of a couple of miles from the colony with no transport facilities. There did not seem to be much of community life in the colonies although the people are almost all of the one class. It strikes one that the D. V. C. has probably missed a great opportunity during the years that have followed the construction days to develop Maithon into a proper

planned town with modern facilities. The attitude survey of the colonists suggested that if it had been developed properly there would have been a more contented environment.

The Damodar Valley Corporation has an Inspection Bungalow, an Island Rest House, one *Yatre Niwas* and two tourists' cottages with a total accommodation of less than 70 persons. The availability of accommodation at all these places is uncertain and depends on the local D. V. C. authorities. The best accommodation is given by the Inspection Bungalow which has a very well maintained garden in pleasant surroundings. It is one of the beauty spots in the State.

The Government of India have provided two Tourist Buses with 28 and 10 seats which could be had on hire if available.

There are two motor boats in the lake available at 50 nP. per head subject to minimum of Rs. 6 for fifteen minutes only. Fishing facility is also given to them by D. V. C. by paying Rs. 5 each for a permit for a whole day. All the motor vehicles are charged 50 nP. for going over the dam bridge one way. The charges are too high.

Amusements.—There are five recreation clubs, viz., Station Club, Maithon Club, Recreation Club, *Mahila Sangh* and *Hindi Sahitya Parishad*. A brief idea of the clubs is given below:—

- (1) *Station Club*.—It was established in 1959 and is meant for officers only. It has a small library and receives grant from Damodar Valley Corporation.
- (2) *Maithon Club*.—It was established in 1953 with the help from Damodar Valley Corporation. It has a small library.
- (3) *Recreation Club*.—It was established in 1949. It receives a grant from Damodar Valley Corporation. It has a small library.
- (4) *Mahila Sangh*.—It was started in 1953 with a grant from Damodar Valley Corporation. This institution has a small library. It has started one music school and two lady teachers from Calcutta come once in a week to take music class.
- (5) *Hindi Sahitya Parishad*.—It was established in 1962. It has a library with 1,000 books. It also receives grant from Damodar Valley Corporation.

The membership of these clubs is poor. The readership at the libraries in these clubs is poorer.

Some of the clubs have occasional sporting tournaments. Indoor games are common. The clubs get a few newspapers in English, Bengali and Hindi. The Calcutta papers are more popular. The circulation figures of these papers are very small.

Education.—Maithon has one primary, one kindergarten, one senior basic and one higher secondary schools. The primary and middle schools are maintained by the State Government. The higher secondary school is maintained by Damodar Valley Corporation.

There are about 50 students including twenty girl students who go to Asansol by bus for college education as there is no college at Maithon or Kumardhubi. The medium of instruction in some of the schools at Maithon is both Hindi and Bengali.

Hospital and Medical Relief.—The Damodar Valley Corporation has a hospital since 1950. The hospital has 26 beds for patients. The following are the statistics of the patients for 1960-61 and 1961-62:—

Year.		Outdoor patients treated.	Indoor patients treated.
1960-61	.. ..	6,151	86
1961-62	.. ..	6,361	105

The indoor beds are not specifically meant for outsiders but in cases of emergency admission is not refused. The doctors also do domiciliary services at the residence of the people at Damodar Valley Corporation. One 100-bedded Employees' State Insurance hospital by Bihar Government is to be started and the site has been selected in Maithon town.

Post Office.—The town has a post office established in 1947. It is under the administrative control of the Superintendent of Post Offices at Dhanbad. On the average 232 money-orders are received every month for the average amount of Rs. 12,464. The average number of money-orders sent out every month comes to 1,115 with the amount of Rs. 47,792. They show that the place is inhabited by outsiders mostly who send money to their families. The total amount of pay distributed to the Damodar Valley Corporation employees was not available.

Telephone Exchange.—There is a telephone exchange at Maithon since 1953 with 87 local installations. There are two exchanges, viz., Asansol and Dhanbad. Asansol Exchange has 19 extensions and Dhanbad Exchange has 21 extensions. Both Asansol and Dhanbad Exchanges are managed by Dhanbad Telephone Exchange. Besides, there are carrier telephones connecting Damodar Valley Corporation grid and power stations and has 11 extensions.

Housing.—The Damodar Valley Corporation has built about 1,200 houses of various types (1962). The standard of minimum accommodation from the Damodar Valley Corporation employees has been fixed at two living rooms with ancillary conveniences. Most of the austerity temporary hutments built in the construction days still exist. Even the Nyssen huts taken over from the military by the Damodar Valley Corporation still exist. Besides, there are some

dormitories where some of the employees of Damodar Valley Corporation live. There is a proposal for constructing 500 quarters for employees and a master plan has been prepared. The present housing accommodation appears inadequate. The Damodar Valley Corporation employees of different grades number about 3,000. The town has very few private houses where the businessmen and shopkeepers reside. There are no churches or mosques or proper burial or cremation grounds. Not much attention has been paid to housing.

Economic condition.—There are about 3,000 employees in the town. Out of this about 30 per cent are office peons, *chowkidars* and drivers, etc. About 60 per cent are subordinate staff of technical and non-technical branch and about 10 per cent are superior staff of technical and non-technical branch. Besides Damodar Valley Corporation employees, some people are engaged in miscellaneous occupations and other services. About four hundred Santhals live in villages Purulia and Kalipahari within the Maithon township. The Damodar Valley Corporation has not acquired their lands. Most of the Santhals earn their livelihood by working in the colliery and industries at Kumardhubi and other areas. A firebricks factory is under construction near Maithon town. This employs about 100 workers, most of whom are the aboriginals of Maithon town. The factory is a private one of a merchant of Chirkunda.

The standard of living of the low-income group people in service classes is very low and the incidence of indebtedness is high. The income of lower income group varies from Rs. 60 to Rs. 100. About 70 per cent of their income is spent on food and drink.

So far as the middle-income group is concerned about 60 per cent of their income is spent on food items about 40 per cent in educating their children, transport, entertainments and others. There are hardly any savings. The cost of living in Maithon town is slightly higher than the neighbouring town of Kumardhubi or Barakar. The middle classes have a better standard of life and often go to Asansol to see the pictures.

The officers of the higher income group have more chances of savings as they have very little expenditure on entertainments. Probably none of them is a member of the Yacht Club or the neighbouring Kumardhubi Club.

General level of prices.—Maithon has one small retail market where most of the commodities locally consumed are found. The retail shopkeepers get their stock from the wholesale dealers mostly from Kumardhubi, Chirkunda and Barakar. *Pan*, *Bidi* and cigarette shops are also available in the town. The market is attended by about 30 sellers of different commodities. The bi-weekly *haat* is attended by about 35 sellers of different commodities and attended by about 400 persons. The retail prices of the commodities are slightly higher than that of Kumardhubi and Chirkunda. There is no wholesale dealer at Maithon.

Vegetables are available in the *hat* at Maithon. Fish is imported from Asansol. There are four retail dealers of fish. The Fish Farm of Maithon also supplies a small quantity of fish, about 20 seers and the rate is Rs. 2.40 per kilogram. To meet the demand the dealers have to import fish from Asansol. There are two meat sellers who come to Maithon market daily to sell the meat. They have to pay Rs. 50 per month for the meat stall as rent to Damodar Valley Corporation.

The people of the town have started an Employees' Co-operative Store in 1962. The number of customers is very small as purchase on credit basis is not allowed.

The town has two liquor shops. The average number of visitors at either place is about 100.

MUGMA.—A suburban village in Sadar subdivision is situated at a distance of five miles from Nirsa. It is under the jurisdiction of Nirsa police-station. It has an area of 811.26 acres with 1,931 souls, i.e., 1,110 males and 821 females according to 1951 census.

The village is important from industrial point of view. There are three Firebrick Industries, viz., Bengal-Bihar Firebricks Industry, Jowahar Firebricks Industry and Bihar Firebricks Industry in the village.

There are three tanks in the village. There are also two temples in the village where the villagers daily congregate to worship.

So far as communication is concerned this village has a railway station, viz., Mugma station where passenger trains running to Asansol, Burdwan and back halt.

There are ten permanent shops in the village and a *hatia* is also held on every Saturday. There are two liquor shops.

As regards medical facilities this Company on behalf of the three industrial concerns has started one dispensary with one male doctor, three compounders and five dressers.

There are two middle schools with 200 students and five teachers each in the village. The incidence of literacy is very low because the villagers are mostly employed in the factories.

The village has a post office started in 1925.

As welfare facilities to the industrial labourers, the industries have started a voluntary welfare centre in the village and an attached library. There is also a recreation club, viz., Narendra Nath Institute established in 1938 which is run on behalf of the factories. For labourers one creche and one canteen have been provided. Besides, the employees of the industries have started an Employees' Co-operative Store in February, 1963. The village is electrified.

NAGARKEARI.—This village is under the jurisdiction of Sadar subdivision. This village was the seat of Nagarkhari Raja before. The ruins of the old palace of Raja are still existing in the village. The family of the Raja is living in the village.

There are a State dispensary and an upper primary school in the village. The village is connected with the District Board road.

PANCHET.—Panchet is at a distance of about 36 miles from Dhanbad town and 29 miles from Govindpur. According to the census of 1961 the total population of the town is 4,700, i.e., 2,752 males and 1,948 females.

The Damodar Valley Corporation has constructed a dam over Damodar river known as Panchet Dam. It is the biggest and the last of the four major dams constructed by the Damodar Valley Corporation. In its first phase programme it was declared open and dedicated to the nation by a woman worker in the presence of the Prime Minister on December 6, 1959.

The four miles long dam of earth and concrete, running north to south, with a vast reservoir full of water and a hydel station producing 40,000 K.W. of power, is a major undertaking. Standing against the backgrounds of the Panchet Hill (the original name is Panch-kot, a cluster of five hills) the dam is a lovely sight. The dam has a surface power house with a provision for two units of 40,000 K.W. each.

It is ten miles from Maithon now connected by a metalled road. The dam area was full of jungles and sparsely inhabited by the tribal people only a few years ago. But today spread over many square miles of hilly and undulating lands, a new town risen as an emblem of regenerated India. All the facilities of a modern town are there and there is a great scope for expansion. Tourism could well be developed and even now many tourists visit the dam. There is at the moment scarcity of accommodation for the tourists. The details of the Panchet Dam have been dealt in Chapter 'General'.

Due to the construction of Panchet Dam 41,461 people were displaced from 19,046 acres of land and 2,119 houses. All the 10,339 families involved have accepted cash compensation for lands and houses. In Purulia district some displaced families wanted waste land to be acquired at their own cost for their resettlement. The work is in progress. Provisions for roads, wells, community centres, etc., have been made for the displaced persons at the sites, where they are resettling.

The Damodar Valley Corporation has constructed an inspection bungalow, a 25-bedded hospital and a basic school at Panchet.

The civic affairs of the town are managed by the Damodar Valley Corporation. The roads are also maintained by the Damodar Valley Corporation. All the roads of the town are metalled.

The town has a post office, police-station, hospital and a basic school.

PATHARDIH.—A village in Sadar subdivision and is a business centre on Dhanbad-Pathardih section of Eastern Railway. There are a railway station and loco shed here.

There are lower, upper primary and middle schools in this village. A *hat* is held twice in a week, i.e., on Tuesday and Saturday.

PINDRAJORE.—It is situated at a distance of 37 miles from Dhanbad on the bank of river Guai. It is said that the Pandavas sojourned in this village for a certain period at the time of their stay in the forests (*Banvas*) and the place has been named after them.

A weekly *hat* is held on Friday and it is visited by five to eight thousand people. All articles of daily use are purchased and sold in this *hat*. There are a Basic Training School, a Health sub-centre, a veterinary dispensary, a P. W. D. rest-house and a Community Development hall in the village.

PUNDRI.—It is under the jurisdiction of Chas police-station and Baghmara subdivision.

This village is famous for its indigenous ironsmiths. There are about 15 families engaged in this industry. They manufacture sword, *tangi*, *kudali*, etc., which are sold in local markets of the district.

PUPUNKI.—This village is situated on the bank of the Damodar river and by the side of Dhanbad-Purulia Road. It is under the jurisdiction of Baghmara police-station and Chas police-station. It is said that Swami Swarupanand Paramhans had started his *ashram* here. At present (1962) his disciples live in the village.

RAJGANJ.—This village is situated 10 miles west of Dhanbad on Grand Trunk Road.

It is said that during the Mughal period there was a military colony in the village.

The working class of the locality is engaged in the Katras Collieries and paddy cultivation. There are lower and upper primary schools, two middle schools and a high school and an Inspection Bungalow in the village.

SIJUAH.—It has been treated as town in the census of 1961. According to 1961 census its total population is 9,997 persons, i.e., 6,229 males and 3,768 females.

This is in the colliery area of the district and there are a number of collieries located here. Fire has recently broken out inside the mines of this town area which is posing a big problem to the authorities.

SINDRI.—Sindri is a satellite town of Dhanbad at a distance of 16 miles from Dhanbad town. The total population of the town according to 1961 census is 41,315, i.e., 24,750 males and 16,565 females. The town has grown mainly out of the siting of the Fertilizer Factory followed by other factories.

The town had been originally sited on high land and has now extended. The annual total production of the Fertilizer Corporation of India located at Sindri is 3,50,000 tons. This is the largest Fertilizer and Chemical Factory in Asia. Now there are also a modern coke plant and a cement factory close to it. The annual production of the Superphosphate Factory is 15,000 tons.

The Fertilizer Corporation of India, Limited, Sindri, has employed about 5,727 persons and a large number of quarters have been constructed by the Company. A hundred-bedded hospital at Sindri has been constructed by the Corporation.

So far as education is concerned the Fertilizer Corporation has opened two high schools for boys and girls, one middle school, one upper primary school, two lower primary schools and one kindergarten school in the town. There is a Bihar Institute of Technology in the town for engineering students.

The civic affairs of the town are managed by a Notified Area Committee and Sindri Fertilizer Corporation of India. The roads are maintained by the Sindri Fertilizer Corporation. All roads of the town are metalled. The details will be found in the Chapter 'Local Self-Government'.

The Fertilizer Corporation has opened a Welfare Centre in which recreational and cultural facilities are provided to the workers. The centre has provisions for indoor games, library, adult literacy centre, training in sewing, knitting, embroidery and fine arts. For outdoor games the Fertilizer Corporation has opened a Sports Association. Besides there is also a cinema house in the town for the recreation of the people.

The town has a police-station, an employment exchange office, a notified area committee and a post office.

It is a place of commercial and trade importance. The commodities like cement, superphosphate fertilizer, etc., are exported to Bombay, Calcutta, Patna and places in Uttar Pradesh, etc.

The town is well connected by roads and the railways. There is no dearth of passenger buses and taxis. With the growth of the town, shopping centres are being opened up but the main shopping centre and the railway station remain to be Dhanbad.

TISRA.—This town in the Sadar subdivision has according to the census of 1961 a total population of 7,470 persons, i.e., 4,815 males and 2,655 females.

There are collieries, lower and upper primary schools in the town.

TOPCHANCHI.—It is the headquarters of police-station and Community Development Block of the same name. It is under the jurisdiction of Baghmara subdivision and is situated near Grand Trunk Road. It is within easy access of railway communications also.

The location with a picturesque background of the Parasnath Hill, 4,400 ft. high and the forest-clad hills round the Topchanchi Lake has made it an attractive spot of tourist in Eastern India. The Topchanchi Water Reservoir has an area of 214 acres and has facilities for picnic and boating in the lake. For the tourists, there are well furnished lake home and a pavilion and Island home in the middle of the lake for the visitors. There is arrangement for cruising and fishing. Jharia Water Board which manages the supply of drinking water to the Jharia Coalfield has its supply of water from the lake and water is taken to the Tila *bandh* reservoir. There is also a Dak Bungalow near the lake and the area has got electricity facilities.

TUNDI.—It is a village in Sadar subdivision situated at a distance of 22 miles north from Dhanbad on Dhanbad-Tundi Road. There are police-station and Block office of the same name.

The village is inhabited by mostly Santhals. There is a daily market.

TUNDOO.—It is a village in Baghmara subdivision situated at a distance of about five miles north from Katras town. It is under the jurisdiction of Baghmara police-station. It has an area of 301.33 acres, 183 occupied houses with 771 souls, i.e., 445 males and 326 females, according to 1951 census.

The importance of the village has much increased because of a factory for lead smelting and refining industry at this place.

So far as communication is concerned this village is situated on the junction of one important road, namely, Dhanbad-Chandrapura Road. It has a halt station where passenger trains from Dhanbad to Chandrapura (Eastern Railway) stop.

As regards medical facilities the lead factory has opened a dispensary with two indoor beds.

There are one primary school and one middle school with 100 and 200 students respectively. The incidence of literacy is very low because the village is surrounded by collieries also. Hence the majority of the villagers get employment in the collieries and lead factory. The village has a sub-post office.

The villagers perform *Durga Puja*, *Dewali* and other festivals every year.

The factory has constructed 100 houses for its employees with free electricity. It has also constructed one canteen where the factory employees get their meals by paying Re. 0-6-0 per meal. The village is electrified.

COMMUNITY DEVELOPMENT BLOCKS.

BAGHMARA-CUM-KATRAS BLOCK.—This Block was established in 1961 as pre-extension block and was converted into

Community Development Block Stage I in September, 1962. It covers an area of 102 square miles with 228 villages and 20 *Gram Panchayats*.

According to the provisional figures of 1961 census its total population was 125,724 persons, i.e., 70,876 males and 54,848 females.

The Block has encouraged cottage industries and organised co-operative societies in the villages. It has also sunk a few wells for irrigation and drinking purposes.

Important *hats* are held at Baghmara and Katras.

BALLIAPUR BLOCK.—This Block was established in 1960 as pre-extension block and was upgraded into Community Development Block Stage I in 1961. It covers an area of 4,637.25 acres with 69 villages. There are 13 *Gram Panchayats* under the Block. According to the provisional population figures of 1961 census its total population was 44,547, i.e., 22,462 males and 22,085 females.

During 1959-60 the total demand of the revenue was Rs. 58,726.73 and collection was Rs. 42,142.46, i.e., 79 per cent and in 1960-61 the total demand was Rs. 69,213.61 and collection was Rs. 54,976.93, i.e., 92 per cent.

The Block has constructed wells for drinking and irrigation purposes. It has also opened night literacy centres.

Melas are held at Jiasi, Pradhanmata, Balliapur and at Paharpur. There are a State dispensary and two veterinary dispensaries under this Block. A few minor cottage industries like basket-making, rope-twisting, etc., are carried on in certain villages.

CHAS BLOCK.—This Block was established in 1956 as pre-extension block but it was converted into Community Development Stage I in 1958. It covers an area of 1,13,758.48 acres with 148 villages and 23 *Gram Panchayats*. According to provisional population figures of 1961 census its total population was 1,10,549 persons, i.e., 56,215 males and 54,334 females. There are 10 per cent tribal people in this Block area. The total collection of revenue during 1961-62 was 82 per cent.

The Block has constructed drinking wells and irrigational wells in the villages for the benefit of the public. The Block area is mainly paddy-growing.

So far as the cottage industry is concerned, the Block has opened Weavers' Co-operative Society and Multi-purpose Co-operative Society, etc. The important *hats* are Chas and Pindrajore and *melas* are held at Chas, Tugri and Pochora.

This Block comes within the belt of the mining area. Recently some coal deposits have been located by the Geological Department in villages Burihinose and Tugri. The eastern portion of this Block comprising 34 villages will come under the extension of Bokaro Steel Project.

CHANDANKEARY BLOCK.—The Block consists of 130 villages with an area of 91,881 acres. About 14.4 per cent of the population are tribal people. It is divided into 10 *halhas*. The revenue demand of 1961-62 has increased to Rs. 1,50,786.45 from Rs. 39,485.00 in 1956-57 due to the fixation of rent under Schedules 5, 6 and 7 of the Bihar Land Reforms Act. This Block is functioning since 20th January 1956. The Block has 24 *Gram Panchayats*.

Three Medium Irrigation Schemes located at Arita, Camaharia and Modidih have been taken up. The schemes at Arita and Camaharia are nearing completion and the scheme at Modidih has recently been taken up. Cultivators are being encouraged to adopt Japanese method of cultivation and to use more chemical fertilizer, etc.

There are two collieries at Amlabad and Sitanala within this Block.

There are one State Dispensary and an Inspection Bungalow at Chandankiary; three Health Sub-centres at Sabra, Mahal and Baramasia; and seven Branch Post Offices at Jhalabardsa, Rangamatia, Bhojudih, Arita, Chandankeary, Chandadra and Mahal. Bhojudih and Telgoria are the two railway stations within this Block.

A dam has been constructed over the river Gobai near Bhojudih Railway Station with a view to supply drinking water to Sindri but Sindri does not require water-supply from this dam. This dam can very well be utilised for rural water-supply in the neighbouring villages.

DHANBAD BLOCK.—This Block is functioning since 1st April 1962 as Community Development Block Stage I. It covers an area of 32,204.89 acres with 85 villages and 14 *Gram Panchayats*. According to the provisional figures of 1961 census its total population is 92,131 persons, i.e., 55,785 males and 36,346 females.

During 1960-61, the net demand of revenue was Rs. 72,976.76 and the net collection was Rs. 57,403.45, i.e., 79 per cent.

The Block has opened grain-golas and has encouraged a few cottage industries.

GOVINDPUR BLOCK.—This Block was opened in 1956. It covers an area of 151.72 square miles and 225 villages. There are 21 *Gram Panchayats* under this Block. The total percentage of annual revenue collection was 96 per cent. According to the census of 1961 the total population of the Block area was 78,456, i.e., 40,029 males and 38,427 females. About 12 per cent of population under the Block area are aboriginals.

The Block office is electrified and about 20 per cent of villages are also electrified. The Block has sunk 100 wells for drinking purposes. There are three grain-golas.

There are 13 industrial co-operative societies. Rope-making, basket-making, carpentry, soap-making, etc., are the main cottage industries of the Block area.

There are five villages under this Block where *melas* are held, namely, Kulbera, Dhijora, Machamahul, Udaipur, Rangdih and Birajpur. A big *hat* is held at Govindpur.

The important roads which pass through the Block area are Govindpur-Tundi Road, Govindpur-Balliapur Road, Grand Trunk Road, Rajganj-Tundi Road, etc. All these roads are metalled.

There are a State Dispensary and three Health Sub-centres under the Block. For the facility of officers and tourists there are three Dak Bungalows—one at Govindpur, another at Sarkadih and the third at Murradih in this Block.

There are post offices at Sarkadih, Govindpur, Asnan, Sungalpur, Birajpur and Nagarkeari.

NIRSA BLOCK.—This Block was established in 1958. It is 20 miles east of Dhanbad on Grand Trunk Road. It covers an area of 172 square miles with 267 villages, 26 *Gram Panchayats* and 12 *Halkas*. According to the provisional population figures of 1961 census its total population was 1,19,096 persons, i.e., 63,271 males and 55,825 females. About 19 per cent of the population are aboriginals.

During 1960-61 the net demand of the revenue was Rs. 1,27,686.12 and the collection was Rs. 1,20,210.92, i.e., 94 per cent.

The Block has repaired 36 *bandhs* and sunk 32 wells for irrigation purposes and for drinking purposes, it constructed 41 wells (1961-62). There are three Health Sub-centres under this Block. There is a Seed Multiplication Farm at Poddardih.

There are one higher secondary school, seven high schools, four senior basic schools, three junior basic schools, ten middle schools, 21 upper primary schools and 112 lower primary schools under this Block. Besides these, 20 social education centres and 24 libraries are also running.

The important cottage industries of this Block are shoe-making, tile-manufacturing, basket-making, etc. About 100 families are engaged in these business. *Hats* are held at Nirsa, Kumardhubi, Bhaluk Sunder, Saluk Chapra, and *melas* are held at Patharkua, Gopalganj, Sarsapahari, Pandra, Pindrahat, etc.

For commercial purposes Nirsa and Chirkunda are very important places. There are one radio assembly unit and one glass factory in this Block. Eight dispensaries are running under this Block. The post offices in this Block are located at Nirsa, Chirkunda, Maithon, Panchet and Kumardhubi.

TOPCHANCHI BLOCK.—It was established in 1954 as pre-extension block and was upgraded as Community Development Block on 1st April 1956. It covers an area of 48,362.12 acres or 74.7 square miles with 121 villages, 10 *Halkas* and 19 *Gram Panchayats*. According to the provisional population figures of 1961 its total population was 46,583, i.e., 23,640 males and 22,943 females. About 8.14 per cent of the total population are tribal people.

In 1960-61, Rs. 48,116.59 as rent, Rs. 5,990.88 as cess and Rs. 5,330.75 as miscellaneous was collected by the Block.

The Block headquarters (Topchanchi) and about 15 villages have also been electrified. It has excavated 92 tanks and constructed 307 minor irrigation wells and 141 drinking wells. It has also constructed four *pucca* roads.

The *hats* are held at Gomoh, Laludih, and Topchanchi. The villages of more than 2,000 population are Hariharpur, Kheshmi, Gunghusa and Topchanchi. There are eight dispensaries in this Block and one Dak Bungalow at Topchanchi. Post offices are located at Topchanchi, Gomoh, Harihapur, Brahmandiha, Tantri and Pradhankhunta.

TUNDI BLOCK.—This Block was opened on 2nd October 1957. It covers an area of 152.0 square miles with 296 villages and 24 *Gram Panchayats*. According to the provisional figures of 1961 census its total population is 59,545 persons, i.e., 30,252 males and 29,293 females. The Block area is populated with 49 per cent tribal people, i.e., Santhals, Oraons, etc.

During 1960-61, the net demand of the revenue was Rs. 1,01,557.02 and the collection was Rs. 78,336.55, i.e., 77 per cent.

The Block has sunk 78 wells and 30 tanks for the benefit of the villagers.

There are two dispensaries and 2 Dak Bungalows under this Block. The whole Tundi Block area is covered with forest and hillocks.

There are grain-golas in this Block.

CHAPTER XVI.

LAND REVENUE ADMINISTRATION.

The district of Dhanbad as is constituted at present was formerly part of the then district of Manbhum. Up to 25th October, 1956, Dhanbad had been functioning as one of the subdivisions raised to the status of a sub-district for all practical purposes with headquarters at Dhanbad.

Since 1879 there had been no change in the jurisdiction of Manbhum till the separation of Dhanbad into a district.

Regarding Revenue Administration in the early British period it has been observed by Shree B. K. Gokhale, I.C.S., in his Survey and Settlement Report of Manbhum district as follows:—

"The early days of British rule were marked by a constant struggle between the authorities and the Zamindar who was persistent in neglecting to pay the revenue demanded, and from time to time portions of the State were made over, generally unsuccessfully to farmers. Eventually the Decennial Settlement was concluded in 1791 with the proprietor, and 18 months later, in March 1793 was made permanent and the revenue fixed at Rs. 55,794, this amount being arrived at by detailed assessment of every village within the zamindari with the exception of the numerous rent free grants, of which a list had been furnished by the Zamindar as early as 1771."

REVENUE SURVEY.

Regarding early Revenue Survey Operation in the then district of Manbhum of which Dhanbad formed a part it has been recorded that the Survey Operation continued from 1861 to 1867. The following quotation from the note on the operation of the Survey in Chotanagpur will indicate the position existing at that time.

"The demarcations were commenced in 1861-62. During the year, 9 Parganas, containing 1,715 villages covering an area of 1,072 square miles were demarcated. During 1862-63, 2,069 villages were surveyed covering an area 1,427 square miles. 3,272 villages were also demarcated. During 1863-64, 992 square miles were surveyed topographically. In addition 16 parganas were demarcated, 7 mauzawar and 9 parganawar, equal to 195 running miles. The latter included 153 Ghatwali villages. During 1864-65, 8 parganas were surveyed, 5 mauzawar and 3 topographically. 390 villages containing Ghatwali lands covering an area of 400 square miles were demarcated and mapped. During 1865-66, 1,034 square miles were surveyed comprising 941 villages, two parganas were only surveyed mauzawar,

the remainder of the work being topographical. During 1866-67 the survey was completed, 9 parganas having been surveyed topographically with the exception of Ghatwali tenures which were demarcated. The remaining parganas were surveyed mauzawar."

There had been some agrarian troubles in 1869 and 1870 between the Zamindar of Tundi and his Santhal raiyats over the question of enhancement of rent and jungle rights. The situation took a serious turn and the then Commissioner Col. Dalton had to intervene. The rights of the tenants in land and in jungle were confirmed. The existing rents were made current for further 7 or 8 years and after the end of that period the zamindar was assured of a moderate increase in rent.

In 1887, a Survey and Settlement of Nowagarh estate was undertaken but it appears that the operation had not been very successful. During the years 1882-83 the Ghatwali Survey of all the lands claimed by the Ghatwals was undertaken. The informal settlements of 52 Santhali *Izara* villages in Tundi Thana were carried out, under the orders of the Commissioner, by the S. D. O. of Govindpur in 1881 and subsequently in 1903 and 1904. The subdivisinal headquarters was located then at Govindpur.

The last survey was undertaken in the district of Manbhum in 1918 to 1925 and the present district of Dhanbad was covered during that period. The survey was made under the Bengal Survey Act (Act V of 1875) and the record of rights prepared under the Chotanagpur Tenancy Act, 1908.

SURVEY OF MUNICIPAL AREAS.

During the period of the last survey (1918-25) Dhanbad was the only Municipality which took full advantage of the operation and a set of maps was prepared showing details. The *khesra* was also prepared giving details.

The agricultural portions of the Dhanbad Municipal area was surveyed as a part of the ordinary district operation.

HISTORY OF LAND REVENUE ADMINISTRATION.

The district of Dhanbad was formerly a part of the district of Manbhum but after 25th October, 1956 was constituted into a full-fledged district. The then district of Manbhum was divided; the Sadar Subdivision (Purulia) of Manbhum going to West Bengal and the residuary portion remained in Bihar. The three Police-Stations, viz., Chandil, Ichagarh and Patamda of the old Manbhum district form part Singhbhum district and Chas and Chandankiary Police-Stations were tagged to the newly created district of Dhanbad. The district of Dhanbad consists of 12 parganas, viz., Pandra, Dumarkunda, Nagarkeary, Tundi, Nowagarh, Jharia, Katras, Jainagar, Khapol, Jaitara, Mahal and Mandra for the sake of Land Revenue Administration.

Now the administration is carried on the basis of Police-Stations and *Anchals*. There are six Revenue Thanas divided into two subdivisions. Thanas are divided into 16 police-stations spread over 10 *Anchals* which are divided into 100 *Halkas*. The details are given below:—

Subdivision.	Revenue Thanas.
1. Sadr Subdivision.	1. Jharia. 2. Gobindpur. 3. Tundi. 4. Nirsa.
2. Baghmara Subdivision	1. Topchanchi. 2. Chas.

Name of P.-S.	Name of Anchal-cum- Dev. Block.	Area in sq. miles.	No. of village.	Total population.
1. Dhanbad	..			
2. Kenduadih	.. Dhanbad Anchal (Halka-8).	50.32	85	1,77,707
3. Jogta	..			
4. Jharia	..			
5. Jorapokhar	.. Jharia Anchal (Halka-8)	50	58	2,14,782
6. Sindri	..			
7. Baliapur	.. Baliapur Anchal (Halka-8).	46	69	44,547
8. Gobindpur	.. Gobindpur Anchal (Halka-10).	151.75	225	78,456
9. Tundi	.. Tundi Anchal (Halka-12)	172	267	1,66,567
10. Chirkunda	..			
11. Nirsa	.. Nirsa Anchal (Halka-12)	152	296	59,545
12. Topchanchi	.. Topchanchi Anchal (Halka-10).	74.7	121	59,161
13. Baghmara	..			
14. Katras	.. Baghmara Anchal (Halka-12).	102	227	1,52,774
15. Chas	.. Chas Anchal (Halka-10)	178	148	1,14,193
16. Ohandankiary	.. Ohandankiary Anchal (Halka-10).	144	180	93,989

With the intent of doing away with an intermediary, augmenting the Government revenue and ameliorating the conditions of the

tenantry, the Government of Bihar passed the Bihar Zamindari Abolition Act, 1949. The validity of this Act was challenged by the land-lords and the court granted several injunctions and ultimately the Act was declared invalid. This Act was replaced subsequently by the Bihar Land Reforms Act of 1950. The validity of this Act was also challenged in Patna High Court which declared that the Act contravenes the provision of Article 14 of the Constitution and was, therefore, invalid. The State Government considered this matter in consultation with the Central Government and it was decided to amend the Constitution and the Constitution's (First Amendment) Bill, 1951 was passed. The competence of the Parliament to amend the Constitution was also challenged in the Supreme Court which ultimately decided the amendment of the Constitution to be valid. In a subsequent reference the Supreme Court also upheld the validity of the Bihar Land Reforms Act, 1950.

Under the provision of the B. L. R. Act, 1950, the estates and tenures vested in State of Bihar and were taken over in three phases.

The bigger estates having an annual income of Rs. 50,000 and above, viz., Jharia, Tundi and Nowagarh vested in Government under notification no. 87-LR, dated 6th November, 1951, no. 60-LR, dated 12th November, 1951 and no. 85-LR, dated 6th November, 1951 respectively.

The other estates and tenures vested in the State of Bihar by area notification no. 3(b) of the B.L.R. Act, 1950 with effect from 1st January, 1956. The estates and tenures falling under the Chas and Chandankiary Police Stations vested in the State by the area notification with effect from 21st September, 1957.

Out of ten *Anchals* nine have been converted into *Anchal-cum-Blocks*. The remaining one *Anchal* has also now been converted into a pre-extension Block.

In the *Anchal-cum-Block*, the Block Development Officer deals with the revenue work besides the development work in the area. At the Subdivisional level, the Subdivisional Officer looks after the revenue work being assisted by a Deputy Collector Incharge, Land Reforms. Further subdivision of an *Anchal* into Revenue *Halkas* has been effected on the general pattern of 10 *halkas* in each *Anchal* with modification and variation in certain cases to suit local convenience. It will, therefore be seen that ten *Anchals* of the district consist of 100 *halkas* on the above pattern but there have been variations in case of each *Anchal*, i.e., Jharia, Baliapur, Dhanbad have 8 *halkas* each whereas Nirsa, Tundi and Baghmara have 12 *halkas* each. The remaining 4 *Anchals*, namely, Topchanchi, Chas, Chandankiary and Gobindpur consist of 10 *halkas* each.

Each revenue *halka* comprises of two Gram Panchayats and the district consists of 203 Gram Panchayats. With the process of democratic decentralisation the revenue work is being gradually entrusted to the Gram Panchayats.

The primary work of rent collection and mutation has now been taken over by the Panchayats and at present 181 Panchayats have been entrusted with the rent collection work. All the Panchayats, however, are doing mutation work.

At the district level, the revenue work is being carried on by the Additional Collector under the general control and supervision of the Collector.

INCOME FROM LAND REVENUE AND SPECIAL CASES.

As a result of the vesting of the intermediary interests the State now collects the rent directly. With the successive notification of the State and with the progressive stabilisation of the revenue administration the rent roll or in other terms the revenue demand has been increasing steadily.

For all practical purposes the present set up of administration came into effect from 1952-53. The rent demands for the years 1952-53 onwards are shown in the table below:—

Years.	Demand in Rupees (current).		
1952-53	35,585
1953-54	35,585
1954-55	1,60,039
1955-56	1,46,424
1956-57	2,81,748
1957-58	3,31,532
1958-59	3,84,187
1959-60	3,91,620
1960-61	4,31,700
1961-62	4,60,152

The complete assessment of the demands has not yet been finalised. The zamindars in many cases did not make over correct zamindari papers like *jamabandis* and some of them did not file any paper at all. To assess the accurate demand of rent and cess, Field *Bujharat* was put into operation by which up-to-date records were to be prepared in respect of the lands after spot enquiries if necessary and the income of the rent and cess therefrom recorded after bearing objections in respect of each village. The work is nearly complete. The accurate demand for the district would be shortly available. In any case, this demand should be higher than the present figures. The potential rent demand of the district taking into account all categories of land as per last survey and settlement report of Shree B. K. Gokhale, I.C.S., has been calculated at Rs. 6,91,093.00. Rent assessed u/ss 5, 6 and 7 of the Bihar Land Reforms Act and on

kabil lagun (assessable) lands kind, rent commuted into cash rent and rent assessed on the lands encroached upon and reclaimed, etc., have to be taken into account to arrive at the correct demand. Besides there has been a large number of acquisitions of land under various Development Schemes, viz., Panchet Dam, Maithon Dam, Sindri Fertiliser, Fuel Research Station and several other projects. The rent of those lands will have to be naturally abated. A sum of Rs. 37,460 is further annually realised by the Mining Department as surface rent. Correct rent demand is expected to be arrived at soon. Until then the firm demand of the district can not, therefore, be correctly ascertained. It is however expected that the total rental demand of the district may go higher by approximately 40 per cent. Due to rapid industrialisation further areas are also likely to be acquired for industrial undertakings, i.e., Bokaro Steel Plant and Coal Washery Plants, etc.

SAIRAT.

Besides income from rent, income is also derived by leasing out Fisheries, *Hats*, *Melas*, Toddy Mahals and Ferry Rights which are negligible in number. These are termed '*sairats*'. The number of different types of *sairats* on the rolls of the district which have been settled so far are as follows:—

Fisheries (tanks)	..	..	620
<i>Hats</i>	..	..	18
<i>Mela</i>	..	..	28
Others	..	..	14
Total			680

The demand of *sairats* from the year 1952-53 and onwards is detailed below:—

Year.	Demand (in rupees).		
1952-53	1,515
1953-54	2,094
1954-55	8,327
1955-56	17,112
1956-57	38,486
1957-58	47,327
1958-59	66,561
1959-60	87,765
1960-61	87,232
1961-62	96,097

CESS.

The District Road Cess Act, 1871 (Bengal Act X of 1871) and the Provincial Public Works Act, 1877 (Bengal Act II of 1877) provided for the construction and maintenance of roads and other means of communication as also for the construction and the maintenance of Public works.

Prior to 1916, cess was payable at the rate of half anna per rupee on the annual value of the estate and tenure and it was known as road cess or Public Works Cess. By amendment of 1916, the nomenclature was changed to local cess and the rate of levy was raised to Re. 0-1-0 per rupee on the annual valuation. The cess rate was again raised in the year 1944-45 to Re. 0-1-6 per rupee of the annual valuation. The present provisions are for the assessment on the annual value of lands at the rate of not less than Re. 0-1-0 or more than Re. 0-2-0 per rupee of the annual value. The maximum rate of Re. 0-2-0 on the rupee was prescribed under Government notification no. 34011-IVC-16-6, dated the 13th March 1956. In the records of rights where there are '*jalsasan*' right, the cess is fixed at the rate higher than the usual cess and in respect of such holdings the same rate of cess is being realised.

Prior to the vesting of the Estates under the Bihar Land Reforms Act, cess was paid to Government by the ex-intermediaries. Now the realisation of cess from the tenants is done by the State directly. The tenants pay generally at the rate of Re. 0-1-0 on every rupee of the rent payable for their lands according to the provisions of the Cess Act. As in the case of the demand of rent collectable from the Raiyats, the cess demand also has not been very accurately ascertained. The exact demand will, therefore, be available only after the Field *Bujharat*, etc., are completed. The following table shows the cess demand during the different years:—

Year.	Local cess demand (in rupees).		
1952-53	6,138
1953-54	6,138
1954-55	34,170
1955-56	27,092
1956-57	57,445
1957-58	43,532
1958-59	32,147
1959-60	32,732
1960-61	35,278
1961-62	36,893

SPECIAL CESS.

In the year 1960 it was decided by the Government to impose Education Cess for implementing the schemes of free and compulsory education. This cess in rural areas is also realised through the revenue agencies. In the Municipal area the cess is being realised by the Municipality. Coal cess which may also be included in special cess is realised on the despatch of coal.

The demand of the Special Cess from 1952-53 onwards is shown in the table below:—

Year.		Colliery cess (in rupees).	Education Cess (in rupees).
1952-53	..	4,78,565	..
1953-54	..	19,32,792	..
1954-55	..	17,80,260	..
1955-56	..	14,18,431	..
1956-57	..	14,81,299	..
1957-58	..	11,64,956	..
1958-59	..	16,84,584	..
1959-60	..	18,60,922	22,876.46
1960-61	..	18,61,226	25,248.43
1961-62	..	19,08,406	26,790.78

BENEFICIAL MEASURES.

The Bihar Waste Land Reclamation, Cultivation and Improvement Act, 1946 (Bihar Act XVI of 1946).

This Act was enacted to provide for the reclamation, cultivation and improvement of waste land and unproductive lands in the Province of Bihar. The area reclaimed so far with Waste Land Reclamation Loan is 1,654.70 acres and 578.40 acres converted into paddy fields with the help of subsidy granted to the tenants. The amount spent over there was Rs. 1,42,146 and Rs. 48,980 respectively.

Bihar Privileged Persons Homestead Tenancy Act.

There is no dearth of homestead land in this district and so far there has been no case under the Act in this district. There was no dispute between land-lords and tenants regarding possession over *bahal* land. To provide a summary and cheap procedure for deciding the disputes over *bakast* lands between land-lord and tenants, the Bihar *Bakast* Dispute Act, 1947 was enacted. This gave relief to a considerable extent to both the parties.

Rent Reduction Operations.

In the thirties of this century there was a slump in prices and it became difficult for most of the tenants to pay rents specially because

of enhancement made by the land-lords. To give relief to the tenants, Rent Reduction Operations were conducted in Dhanbad between 1939-40 and substantial relief accorded to the tenants from this operations. The total number of cases for reduction of rent u/s 33 (A) of the Chota Nagpur Tenancy Act was 4,013. The total amount of reduction made was Rs. 69,558-15-5½. A number of Gazetted Officers with large staff had been employed on this operation. The relief to the tenants was not inconsiderable.

Bihar Private Irrigation Works Act, 1922 was amended in 1939. According to this amendment the Collector under the Act was empowered to get the irrigational schemes which had been neglected by the land-lords concerned repaired and to realise the cost of such repairs from them.

The total number of schemes taken up and completed from 1947-48 to 1958-59 is given below:—

Year.			No. of M. I. Schemes taken up.	No. of M. I. Schemes completed.	No. of Schemes dropped.
1947-48	..	..	49	16	..
1948-49	..	..	232	151	36
1949-50	..	..	294	326	..
1950-51	..	..	519	415	44
1951-52	..	..	397	228	153
1952-53	..	..	21	..	137
1953-54	..	..	70	9	..
1954-55	..	..	143	26	158
1955-56	..	..	131	94	12
1956-57	..	..	40	55	1
1957-58	..	..	32	27	4
1958-59	..	..	..	8	28
Total	..	..	1,928	1,355	573

With the abolition of Zamindari the responsibility for the efficient management of the irrigation works has devolved on the State Government. The Government have been spending large amount over the construction and maintenance of irrigation channels, tanks, *bandhs*, etc. Other works of improvement of hats, bazars, providing drinking water facility, etc., are also financed out of revenue funds. Such of the charitable institutions maintained by the land-lords as have specific properties assigned for their maintenance are also being maintained by Government.

Bihar Money-Lenders Act, 1938 was passed and brought in operation to safeguard the raiyats from the professional borrowers and money-lenders who advanced to the labour money on very high interest. The number of valid licence on 31st March 1962 was 1,363 only. The rate of interest is now fixed. The provisions have been discussed elsewhere.

Bihar Panchayat Raj Act was also introduced in 1948 and the poor people were saved from being dragged to court unnecessarily by the well-to-do people and petty quarrels are settled or decided locally. The provisions have been discussed elsewhere.

LAND REFORMS.

The zamindari system with a permanent settlement was a source of strained relations between the land-lords and tenants. The margin of profit secured for the ex-land-lords enabled them to enjoy a life of ease and they could overlook the interest of the tenantry with impunity. It may very well be said that the permanent settlement brought a sort of benevolent despotism by the land-lords whose interests were well protected by the law and the tenants a comparatively much poorer proletariat. Land-lords were made the immediate masters of the tenants by statutory law and the Government could come to their rescue more indirectly. There were only a few zamindars who maintained their irrigation system in an efficient state or spent over the improvement of their zamindars. The *Bhoulidars* or those who paid rent in kind by giving a share of the crops were mostly not granted any rent receipts and the normal attempt was to take out as much as possible from them. In the matter of settlement and mutations also the land-lords used to realise exorbitant *salami* (a sort of arbitrary levee). The tenants cultivating the personal (*bakast*) lands of the land-lords were completely at their mercy and were frequently ejected. The land-lords were careful to see that no tenancy rights were created in them. The Government were alive to the oppression of the tenantry and took a series of steps by successive legislation and finally by the abolition of the zamindari system by the Bihar Land Reforms Act, 1950.

The Survey and Settlement Operations of 1896—1903 for the first time made reliable records of the rights of the tenants and decided many of the long standing anomalies. This was a land mark in the stabilisation of the tenants' interest on the land.

With the spread of education and the political movements the tenants became more alive to their condition.

In 1922-23 *Kisan Sabhas* were organised which ventilated the grievances of the tenants and their exploitation at the hands of their land-lords. The grievances were highlighted and a bitter climate was created. In subsequent years the rent reduction proceedings were taken up on a sufficiently large scale for the benefit of the tenantry. The explosiveness of the situation was mellowed by these measures.

Prior to year 1934 the recognition of any transfer of *rayati* lands was at the sweet will of the land-lords. Exorbitant *salamis* used to be charged from the transferee by the land-lords for according recognition to the purchasers and for mutation of their names. Even after the payment of *salami* the purchaser had to execute a deed of surrender in respect of the purchased land and then to take a fresh settlement of the same from the land-lords at an enhanced rent. *Salami* could be as high as 25 per cent of the consideration money. The raiyat had also no right to manufacture bricks or tiles or to erect any building without the consent of the landlord. This consent was purchased only by a handsome *salami*. To help the tenants, amendments to the Chotanagpur Tenancy Act (2) of 1908 were enacted in regard to sale or gift without transfer fee and for succeeding period a fee of Rs. 2 per cent over the consideration money was fixed as landlord's fees. The raiyats were given full rights in their lands and with the enforcement of the provisions they could use their lands for all legitimate purposes and dispose of the same at their will without the consent of the land-lord. The land-lord's fee was reduced to a nominal amount which had to be deposited at the time of the registration of the deed of transfer. The provisions of the Chotanagpur Tenancy Amendment Act, 1947 brought further relief to the tenantry by conferring upon them the right over all the trees on their holdings. They could now plant trees or bamboos and cut and appropriate the same. They could also appropriate the flowers and fruits and other products in trees and bamboos. Besides, insertion of section 21 (a) in the Chotanagpur Tenancy Act by the aforesaid amendment also entitled the raiyats to the trees over it (Section 40-B). Any realisation of *Tahrir* (illegal execution) by the land-lords or their agent was made penal. The provisions were also made for the payment of rent by postal money-order so that *Amlas* (subordinate employees) and the land-lords may not avoid the acceptance thereof. In case of refusal the rent could be deposited in the Government treasury.

The Old Tenancy laws did not provide any safeguard for the non-occupancy raiyats. By the amendment of the Chotanagpur Tenancy Act in 1938 non-occupancy raiyats were granted some statutory rights u/s 42 of the Act.

The ownership of the cultivable lands was hitherto limited to a small percentage of the population. There was no equitable distribution of land with the result that the major bulk of the population had to be dependent on agricultural labour and on such scanty areas of land as fell to their share. While the large cultivators were incapable of obtaining the maximum yield by intensive cultivation on their lands, the others did not have sufficient lands to utilise their potential man power. The result in both the cases was an unbalanced and uneconomic farming. The disparity in distribution of lands was a serious handicap in all agricultural developments. For all this the Fixation of Ceiling Area and Acquisition of Surplus Land Act was passed in the year 1961.

Another handicap which seriously jeopardised good cultivation was fragmentation of the holding. The lands were, due to successive transfers, partition, etc., reduced to very small holdings. Often a raiyat's holding lay scattered over different areas of the village and difficulties in supervision frequently rendered it difficult to plough them all on any economic basis. For the consolidation of the holdings, Bihar Consolidation of Holdings and Prevention of Fragmentation Act was passed in the year 1956 (Act 22 of 1956).

The changes in agrarian laws to ameliorate the condition of tenants may be reiterated as follows:—

- (1) Under section 21-A of the Chotanagpur Tenancy Act (inserted by the amendment Act of 1947) the raiyats got full rights over trees standing on their holdings from before or planted by them on such holdings.
- (2) The Chotanagpur Tenancy Act was amended and a new section 23-A was inserted under which registration fee payable to the landlords was fixed and no discretion was left to the landlords to demand a higher fee for mutation of the name of a purchaser.
- (3) Section 46 of the Chotanagpur Tenancy Act was amended to include backward classes in respect of whom restriction on transfer of land was imposed with a view to guard against alienation of holdings to persons other than the members of scheduled caste, scheduled tribes and backward classes.
- (4) Under section 49 of the Chotanagpur Tenancy Act transfer for the purpose of charitable, religious, or educational purposes or for any other purposes for which the State Government may by general or special order declare to be a public purpose or for the purposes of manufacture or irrigation or as the building ground for any such purpose was permitted with the approval of the Deputy Commissioner. This has

facilitated industrialisation of the area. The land can be made available by transfer for the industrial purposes, of course, with the permission of the Deputy Commissioner.

- (5) A new section 61 of the Chotanagpur Tenancy Act was inserted according to which a raiyat has the right to get his produce rent converted into Cash Rent.
- (6) Similarly section 63 of the Chotanagpur Tenancy Act was inserted which is a penal section and any landlord realising any excess rent either in cash or kind other than the rent of the holding is liable to criminal prosecution.

PAYMENT OF COMPENSATION.

Ad-Interim payment.—Because the ex-land-lords had not filed complete and authentic papers, delay was being made in payment of compensation and therefore Government decided to pay *ad interim* compensation in form of interest till final compensation is paid to them. Under section 33 of the Bihar Land Reforms Act *ad interim* payment is to be made to the ex-intermediaries. The expenditure over *ad interim* payments year to year is as follows:—

Serial no.	Year.	Expenditure (in rupees).
1.	1956-57	61,999.69
2.	1957-58	2,13,999.81
3.	1958-59	1,67,865.63
4.	1959-60	2,88,983.00
5.	1960-61	1,70,858.00
6.	1961-62	1,60,945.00

In a fairly large number of cases the amount payable is too meagre and it has to accumulate for several years before it can be remitted to the payees by money-order. There are also cases in which the liability exceeds the asset and in such cases *ad interim* payments are not being made. Fixation of rent on the lands saved to them under sections 5, 6 and 7 of the Bihar Land Reforms Act is near completion and calculation of their assets afresh has been started.

PAYMENT OF 100 PER CENT AND 50 PER CENT COMPENSATION.

The total number of intermediaries including co-sharers who have filed returns is 10,595. The actual no. of ex-intermediaries whose estates have vested is still not known because all the ex-intermediaries have not filed returns. The exact number can be

available only after completion of *Khewat-Bujharat*. *Khewat Bujharat* is also nearly complete and paper work is in progress. As soon as combined *Khewat* and *Khatian* of each village is ready the actual number of ex-intermediaries will be ascertained. So far final compensation has been paid Rs. 26,800 to 54 ex-intermediaries. Draft compensation assessment rolls have been published in respect of 1,627 ex-intermediaries and they are expected to be paid compensation very shortly (March, 1963). Besides the fact that the zamindars have not filed complete and authentic papers, this district has got its own problem in finalising payment of compensation. The district having mainly coal bearing area, there are 144 mining interests and also 557 forest villages. For final assessment of compensation in respect of the ex-intermediaries who hold above interests also the Collector has to depend on the District Mining Officer, Forest Settlement Officer and the Divisional Forest Officer.

Keeping in view the further delay in payment of final compensation Government decided to pay 50 per cent compensation to the intermediaries on the approximate amount of compensation. Accordingly Section 32A has been inserted in the Bihar Land Reforms Act. Under this section Compensation Officers are empowered to make payment of 50 per cent of the approximate amount of compensation, if they are satisfied that delay is likely to occur in payment of compensation under section 32 of the Bihar Land Reforms Act. So far 50 per cent compensation has been paid Rs. 16,84,150 to 4,885 ex-intermediaries. Compensation work is being given top priority and it is expected that in all simple cases in which no complications are involved payment of compensation will be made under section 32 and in other cases 50 per cent of approximate compensation will be paid under section 32-A shortly.

BHOODAN.

Bhoodan Movement was launched by Sri Acharya Binova Bhave, a disciple of Gandhiji for the distribution of land equitable as far as possible. The removal of the disparity is sought to be done by peaceful and voluntary methods. Persons possessing lands are requested by the workers to donate lands and the lands received in donation are settled with landless persons. To facilitate the work of Bhoodan, the Government have passed the Bihar Bhoodan Yagna Act, 1954 which provides for the donation and settlement of lands in connection with the movement. A statutory committee known as the Bihar Bhoodan Yagna Committee has been constituted under section 3 of the Act to administer all lands received in donation. Donations received are confirmed by the Revenue Officers. Pecuniary help in form of subsidy and loan are given to settlees of the Bhoodan land for purchase of agricultural implements, etc., to help

them in cultivation. The achievements made in connection with Bhoodan are given below:—

1. No. of <i>Danpatras</i> (documents for gifts) filed	880
2. Total area of land donated	7,625 acres.
3. (a) No. of <i>Danpatras</i> confirmed ..	705
(b) No. rejected	13
(c) Pending	162
4. No. of Bhoodan Tenants with whom settled	1,177
5. Total areas settled	1,872 acres.

LAND CEILING.

The Bihar Land Reforms (Fixation of Ceiling Area and Acquisition of Surplus Land) Act, 1961 (Bihar Act XII of 1962) has been enacted to provide fixation of ceiling, restriction on subletting and resumption by certain raiyats, personal cultivation of land and acquisition of surplus land by the State in the State of Bihar, and the matters connected therewith. The Act having been assented to by the President on the 8th March, 1962, came into force on the 18th April, 1962 and extends to the whole of Bihar. It was published for general information with the Law Department notification no. LG1-068/59-Leg.—661, dated the 18th April, 1962 corresponding to 28th Chaitra 1884 (BS).

Section 5 of the Act mentions that it shall not be lawful for any person to hold, except otherwise provided in this Act, land in excess of the ceiling area. The total land of any person in whole of the State shall be taken together for determination of the total area for the fixation of the ceiling (evident from sections 6, 9, 11 and 15).

'Person' occurring in the foregoing paragraph includes any company, institution, trust, association or body of individuals whether incorporated or not [Section 2 (g) Expl. (ii)].

The Ceiling area as mentioned above differs according to the nature or class of land. The definition of class of land has been given in section 4 of the Act. There are five classes of land as follows:—

- Class I—20 acres (land irrigated by flow irrigation).
- Class II—30 acres (land irrigated by lift irrigation work).
- Class III—40 acres (orchard or land used for horticultural purposes).
- Class IV—50 acres (Diara land).
- Class V—60 acres (hilly, sandy, surplus, homestead land or other land none of which yield paddy, rabi or cash crops).

Under the explanation (ii) of section 5 (3) one acre of Class I land shall be deemed to be equivalent to 1.50 acres of Class II, 2 acres of Class III, 2.50 acres of Class IV and 3 acres of Class V.

'Land' means land which is used or capable of being used for agriculture or horticulture and includes land which is an orchard, *kharhur*, or pasture or the homestead of a land-holder (Section 2-F).

It is clear that the Act imposes restriction on possession of land in excess of the ceiling area fixed under the Act irrespective of the fact whether the land is used for agricultural or non-agricultural purposes. It equally applies to coal mining industry as is applicable to other industries. However, under section 29 (b) (vii) exemptions to possess land in excess of the ceiling area can be accorded if the land is required for non-agricultural and industrial purposes. The powers to accord such exemptions however solely lie with Government.

Under section 5 (d) of the Act persons holding land in excess of the ceiling area were given option to transfer, by way of gift, any land held by them to their sons, daughters, etc., within 6 months from the date on which the Act came into force, i.e., from 19th April, 1962 to 18th October, 1962. This provision has subsequently been extended till 18th April, 1963 by an Amendment Act (Bihar Act XVIII) of 1962. Accordingly persons having lands in excess of the ceiling area can avail of this opportunity till the period expires without any hazard to them.

Section 16 (1) of the Act imposes restriction on acquiring land in the case of the transferee's holding land in excess of the ceiling area from before together with the land so to be acquired. The transferees, therefore, have to file a declaration before the Sub-Registrar of the local land registration office. As per provision of the aforesaid section, the registration can be refused in case the transferee possesses land in excess of the ceiling area.

The provisions of the Act have not been implemented virtually though these have come into force due to the fact that the rules have not been received as yet. The rules have been drafted and published for general information but have not been passed by the Legislature as yet.

In the meantime, detailed information regarding persons holding lands in excess of the ceiling area, the area covered under tree plantation, lac breeding centres, religious trust, etc., are being collected.

CONSOLIDATION OF HOLDINGS.

On experimental basis, in one of the blocks of the district, namely, Topchanchi, the work of consolidation of holdings has been started in pursuance of Government orders in Revenue Department

notification no. A/TC-106/58-I.III6-RT, dated 11th August, 1958 that came into effect from 15th August, 1958. In the first opening stage of the scheme however the work could not proceed due to political opposition and thus remained suspended till February, 1959.

The first phase of Consolidation work, i.e., Survey of land was started in February, 1959 which was an up-till task as the persons in opposition had to be convinced about the benefit of the consolidation work.

The block consists of 121 villages with an area of 76 sq. miles, in acreage it is 48,800 acres with 1,16,213 plots according to last survey.

In the initial stage of consolidation work, i.e., in 1959-60 the work in main was confined to *Kistwar, Khanapuri* and attestation only in two villages on experimental basis consolidation work was taken up.

The detailed progress under various stages of consolidation scheme is given below:—

Serial no.	Stages.	1950-60.	1960-61.	1961-62.	1962-63 upto Feb. 1963.	total.
1	2	3	4	5	6	7
1	<i>Kistwar Khanapuri</i> ..	12	29	40	15	96
2	Attestation ..	12	14	35	26	87
3	Draft publication u/s Chotanagpur Tenancy Act.	7	9	23	43	82
4	Preparation of register of land u/s I, C. H. Act.	6	9	24	36	75
5	Draft publication u/s 10, C. H. Act.	6	9	24	31	70
6	Preparation of draft scheme u/s 11, C. H. Act.	4	9	18	25	56
7	Draft publication, u/s 12	4	9	18	13	44
8	Confirmation of consolidation scheme, u/s 13(4).	2	7	18	7	34
9	Delivery of possession, u/s 14, C. H. Act.	2	5	10	17	34

CO-OPERATIVE FARMING.

The district of Dhanbad is a hilly tract and it has got no adequate irrigational facilities. It is undergoing industrialisation very fast and over a major portion of the area mining operation is being done. The people are backward. In the circumstances the formation of successful running of co-operative farming is a difficult task in this district. Still after considerable efforts, the following co-operative farming societies have been formed and are functioning.

- | | |
|----------------|--------------------|
| 1. Radhanagar | Baghmara Anchal. |
| 2. Bamandarika | Chas Anchal. |
| 3. Modidih | Chandankiary |
| 4. Kotaldih | Topchanchi Anchal. |

The practical work of these societies is not much chiefly for want of adequate irrigational facilities and backwardness of the people.

SETTLEMENT OF LAND WITH THE LANDLESS.

The question of settlement of land with landless labourers of scheduled castes, scheduled tribes and backward classes was under the serious consideration of Government. Up-till December 1962 lands have been settled with these classes as given below:—

Name of caste.	Total area settled.	Total no. of persons with whom settled.
Scheduled castes ..	3,176.07 acres ..	1,792
Scheduled tribes ..	1,840.89 acres ..	855
Backward classes ..	247.66 acres ..	135

MATERIAL CONDITION.

Broadly the district can be divided into 2 parts on the basis of livelihood pattern. One part, viz., Jharia, Jorapokhar, Kenduadih, Jogta, Katras, Baghmara, Chirkunda and part of Dhanbad, Baliapur and Chandankiary police-stations depend largely on earnings from collieries and other industries. The inhabitants of Gobindpur* Tundi and Topchanchi. Chas and the greater part of Chandankiary are more dependant on agriculture.

The type of industries that give employment to the labourers of the district is mainly coal mining. There are also other industries like Sindri Superphosphate Factory, Fertilisers Factory, Cement Factory, Refractories, etc., that afford employment to quite a substantial percentage of the population. Dhanbad is a single crop area. Thus for most part of the year the cultivators and the agricultural labourers go to the industries and collieries for work.

Although there is a separate chapter on Economic Trends, the material condition as determined by the occupations of the people may be reiterated in this chapter as well.

* Also self as Govindpur (P. C. K. C.).

According to the 1951 Census the division of population in the sub-district of Dhanbad was as follows:—

(a) Cultivators	..	..	3,24,794
(b) Labourers	..	..	23,708
(c) Artists	..	..	11,681
(d) Other persons	..	..	5,46,129

Dhanbad is the only district unit where non-agricultural population outnumbers the agricultural population. Roughly during 1951 Census 52 per cent of the total population derived their livelihood from the non-agricultural occupations but there are wide variations from one part of the district to another. The central zone consisting of Jharia, Kenduadih, Dhanbad, Jorapokhar, Jogta, Sindri, and Katras police-stations non-agricultural occupations account for 82.1 per cent of the population whereas in the remaining police-stations of Gobindpur, Baliapur, Topchanchi, Baghmara, Tundi and Nirsra the livelihood is from agricultural pursuits. It has to be mentioned that in Nirsra police-station after 1951 Census a large population was displaced due to the construction of the Panchet Dam and Maithon Dam which also included large areas of first class paddy lands thus forcing the people to join non-agricultural pursuits. The percentage of people deriving livelihood from agricultural pursuits in these police-stations has gone down.

During the 1951 Census the police-stations of Chas, Chandankiary were not included in this district. The percentage of population depending on agricultural pursuits in these two thanas is about the same as Gobindpur and Topchanchi police-stations. Revenue Thana Tundi was as it still is a purely agricultural tract while about 98.2 per cent of the population of Jharia police-station was profitably employed on non-agricultural occupations. The position continues to be the same even today.

During the Census of 1951 self-supporting persons, i.e., those who were in receipt of some income either in cash or in kind which was sufficient at least for their own maintenance numbered 3.02 per cent excluding Chas and Chandankiary and constituted roughly 41.3 per cent of the population of the then sub-district; 2.5 per cent of the population were classified as earning dependants and the remaining 56.2 per cent as non-earning dependants. With the addition of Chas and Chandankiary police-stations to the newly constituted district of Dhanbad the percentage of self-supporting persons in the district is likely to go down a little because in Chas and Chandankiary police-stations the number of dependants is likely to be large. It is, however, difficult to give the exact percentage of these persons without the census figures.

The total area of the district including Chas and Chandankiary is 7,11,040 acres. Out of this 1,01,797 acres are unculturable waste. The total area under cultivating tenancies shown in the last survey

was 4,23,927.61. The *per capita* land on the basis of the present population works at 0.36 acres. If we add the total area of culturable waste which is 1,37,315.78 acres even then the *per capita* lands will be 0.51 acre.

The larger proportion of the land in the district are *tanr* (un-fertile up lands) lands. Over and above this, quite a large area of first and second class of land have gone under the water of Maithon and Panchet reservoirs. Similarly a fairly large area has been acquired for the industries of the collieries. In certain areas lands have been rendered unfit for cultivation due to subsidence on account of extraction of underground coal or are declared danger zone because of fires, etc.

It will be seen that the available land is not at all sufficient for supporting even its agricultural population. The condition of the people who depend entirely on agriculture can by no means be said to be good. The district has to import large quantity of foodgrains from outside besides the foodgrains that come through normal trade channels.

The possibilities of further development of agriculture in the district does not appear to be very bright. Even during the last Survey and Settlement Operations it was felt that the extension of rice land cultivation in the district had practically reached its limit. Besides this wages are so high that it has ceased to be an economical proposition to convert further up lands into Dhani III lands. Crop in such land is liable to failure, except in very favourable years. Reclamation of waste lands for cultivation is a very costly affair and may be quite uneconomic in the long run. In the colliery area specially further extension of rice lands is almost stopped. Uplands cultivation is so un-productive as to yield very little profit even when the land is cultivated for 3 or 4 years. Lack of irrigation facilities is a great handicap.

As has been indicated earlier labour in the collieries and industries that have developed is a source of income of the people in the district. The industries and collieries have been supporting labourers of the district and from outside. It is easy now for a man to earn about Rs. 3 or more by manual labour per day. It is, therefore, natural that the district has not developed much of agriculture and the accent should be on more well-planned industrialisation. It is therein that the economic uplift of the indigenous population lies. The villagers travel even 20 miles by buses to go to the industries where they work.

APPENDIX.

STATEMENT (1).

JHARIA COAL FIELD (DHANBAD DISTRICT).

Year.	Raising.		Despatch.	
		Tons.		Tons.
1910	..	5,704,534	..	Not available.
1911	..	6,373,673	..	" "
1912	..	7,653,342	..	" "
1913	..	8,606,223	..	" "
1914	..	9,125,007	..	" "
1915	..	9,077,221	..	" "
1916	..	8,917,330	..	8,247,317
1917	..	9,675,084	..	8,416,200
1918	..	10,761,848	..	8,539,990
1919	..	11,968,981	..	8,166,667
1920	..	9,159,232	..	8,814,474
1921	..	9,878,815	..	8,614,758
1922	..	9,748,541	..	7,558,904
1923	..	10,172,935	..	8,598,200
1924	..	10,692,442	..	9,457,265
1925	..	10,545,401	..	9,139,451
1926	..	10,304,841	..	9,209,443
1927	..	10,529,553	..	9,352,950
1928	..	10,033,924	..	9,077,334
1929	..	10,732,355		Not available.
1930	..	10,697,322	..	" "
1931	..	9,699,511	..	" "
1932	..	8,494,115	..	" "
1933	..	7,961,225	..	" "
1934	..	8,999,096	..	" "
1935	..	9,152,021	..	" "
1936	..	8,737,713	..	" "
1937	..	9,479,775	..	" "
1938	..	10,998,172	..	" "
1939	..	10,444,486	..	" "
1940	..	11,122,987	..	" "

Year.	Raising.		Despatch.	
		Tons.		Tons.
1941	..	11,651,330	..	Not available.
1942	..	11,991,616	..	" "
1943	..	10,062,982	..	" "
1944	..	10,570,706	..	" "
1945	..	11,466,405	..	" "
1946	..	11,545,641	..	" "
1947	..	11,623,055	..	8,820,338
1948	..	11,353,389	..	9,215,738
1949	..	12,130,898	..	10,209,151
1950	..	12,575,321	..	9,562,814
1951	..	13,001,015	..	9,758,742
1952	..	13,157,699	..	10,096,773
1953	..	12,922,477	..	9,887,464
1954	..	13,071,233	..	10,033,391
1955	..	13,270,838	..	10,029,764
1956	..	13,821,009	..	10,893,176
1957	..	14,487,378	..	11,141,377
1958	..	14,789,290	..	11,890,365
1959	..	14,756,067	..	11,643,309
1960	..	15,849,994	..	12,269,728
1961	..	16,595,987	..	13,591,317
1962	..	18,327,927	..	15,096,048

SOURCE :—Chief Inspector of Mines, Government of India,
Dhanbad.

STATEMENT (2).

JHARIA COAL FIELD (DHANBAD AND HAZARIBAGH DISTRICTS).

Year.	Raising.		Despatches.	
		Tons.		Tons.
1928	..	10,665,479	..	9,100,529
1929	..	10,785,745	..	9,668,486
1930	..	10,753,858	..	9,051,566
1931	..	9,755,037	..	7,797,318
1932	..	8,551,283	..	6,835,854
1933	..	8,014,949	..	6,743,325
1934	..	9,057,546	..	7,487,498
1935	..	9,245,292	..	7,529,072
1936	..	8,830,144	..	7,046,884
1937	..	9,601,230	..	7,748,284
1938	..	11,144,462	..	8,026,724
1939	..	10,529,159	..	8,230,397
1940	..	11,218,906	..	8,971,964
1941	..	11,752,025	..	9,232,894
1942	..	12,133,186	..	7,989,548
1943	..	10,145,830	..	8,911,934
1944	..	10,722,004	..	9,139,226
1945	..	11,662,569	..	9,132,091
1946	..	11,801,188	..	9,568,034

SOURCE :—Chief Inspector of Mines, Government of India, Dhanbad

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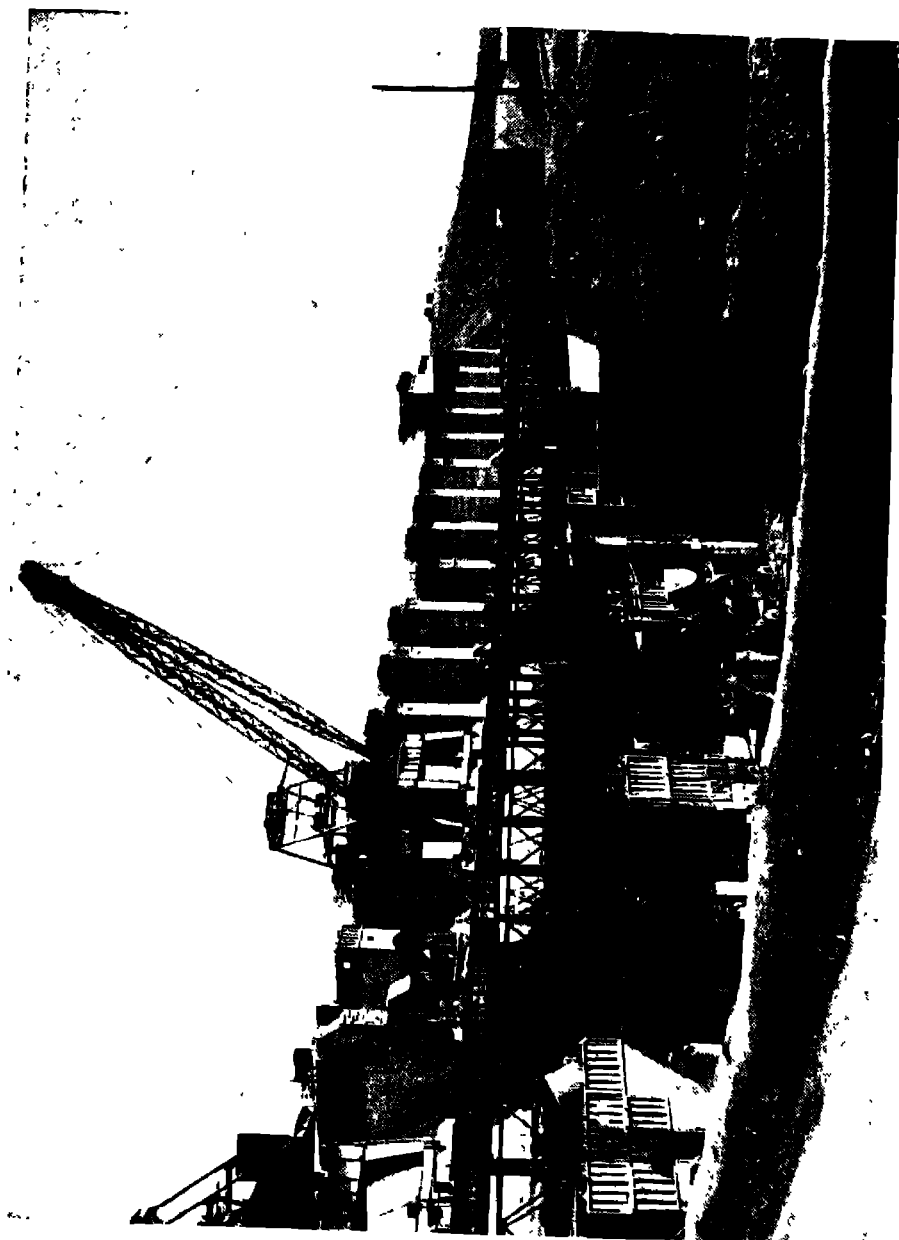
Plates



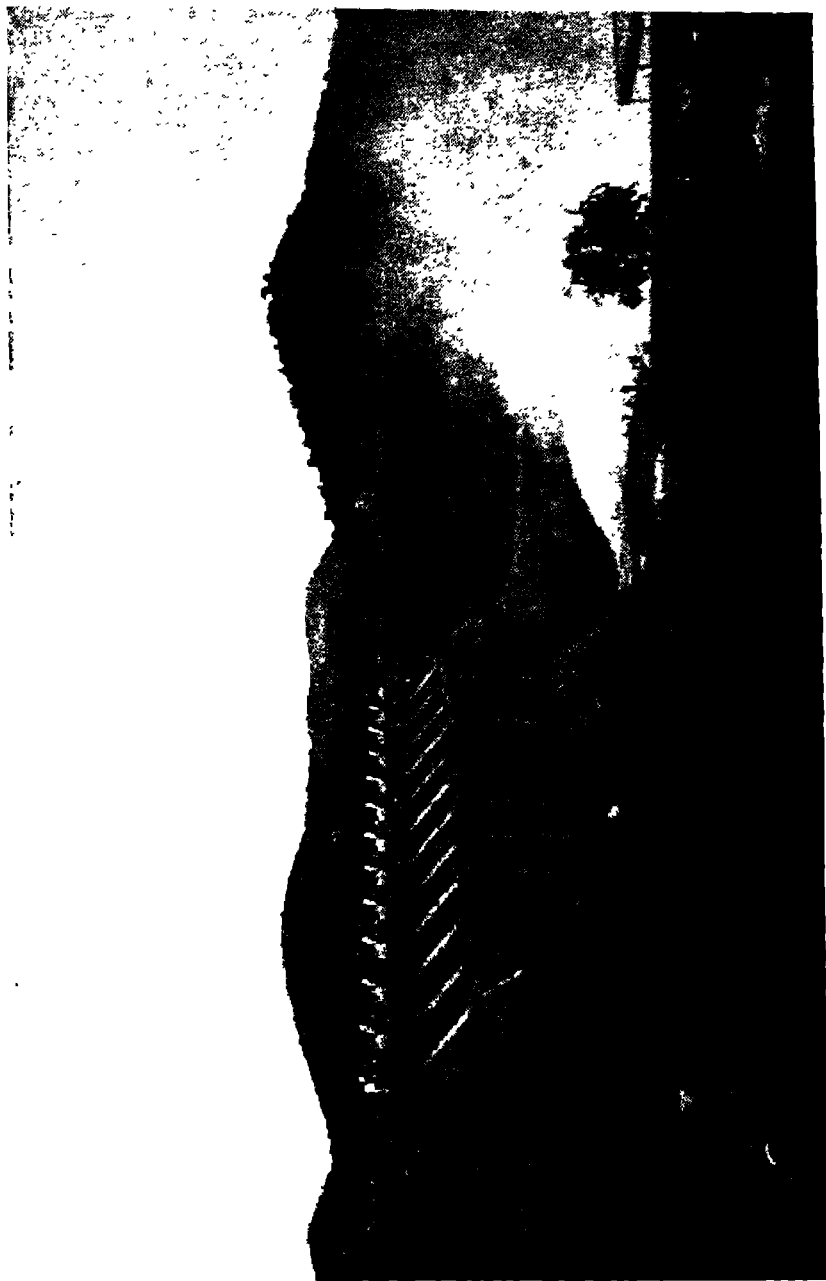
Telmacheo Bridge over Damodar river at Telmacheo, Dhaubad.



A portion of the Sindri Fertilizer Factory, Sindri.



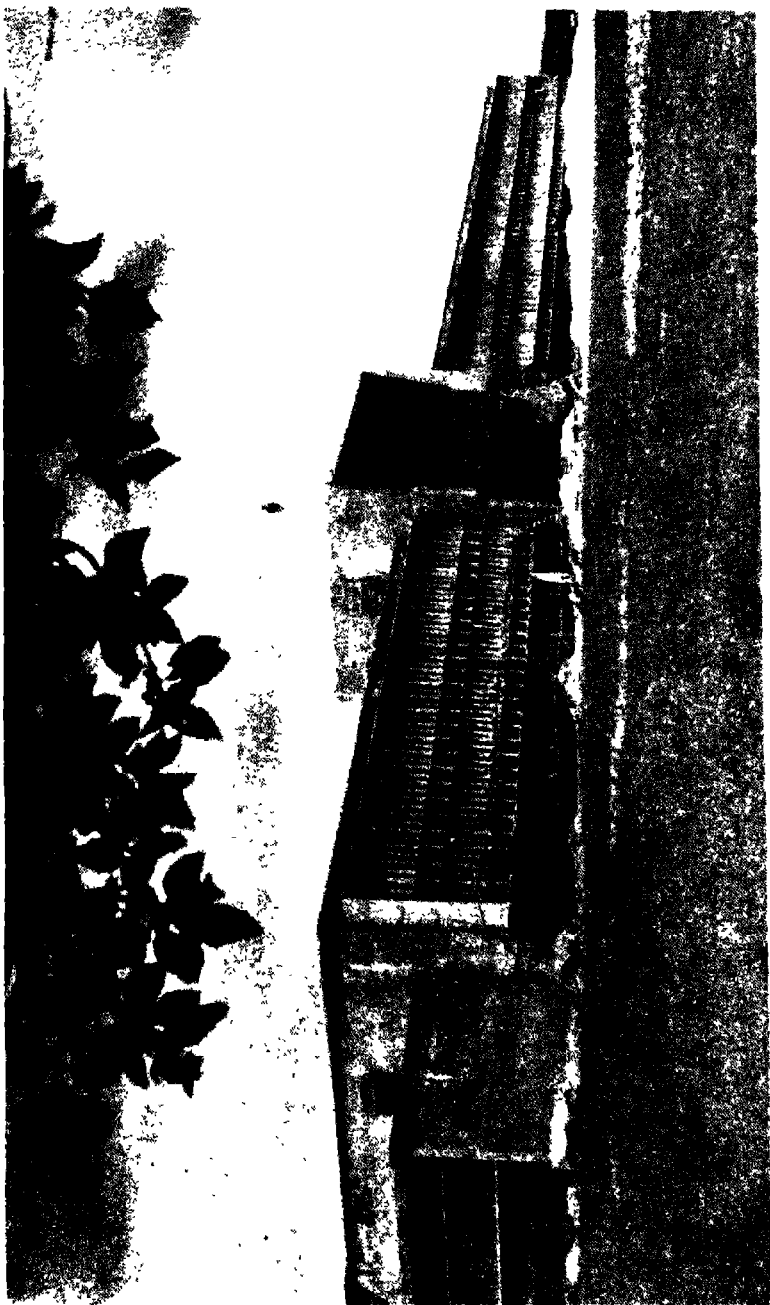
Panchet Dam under construction.



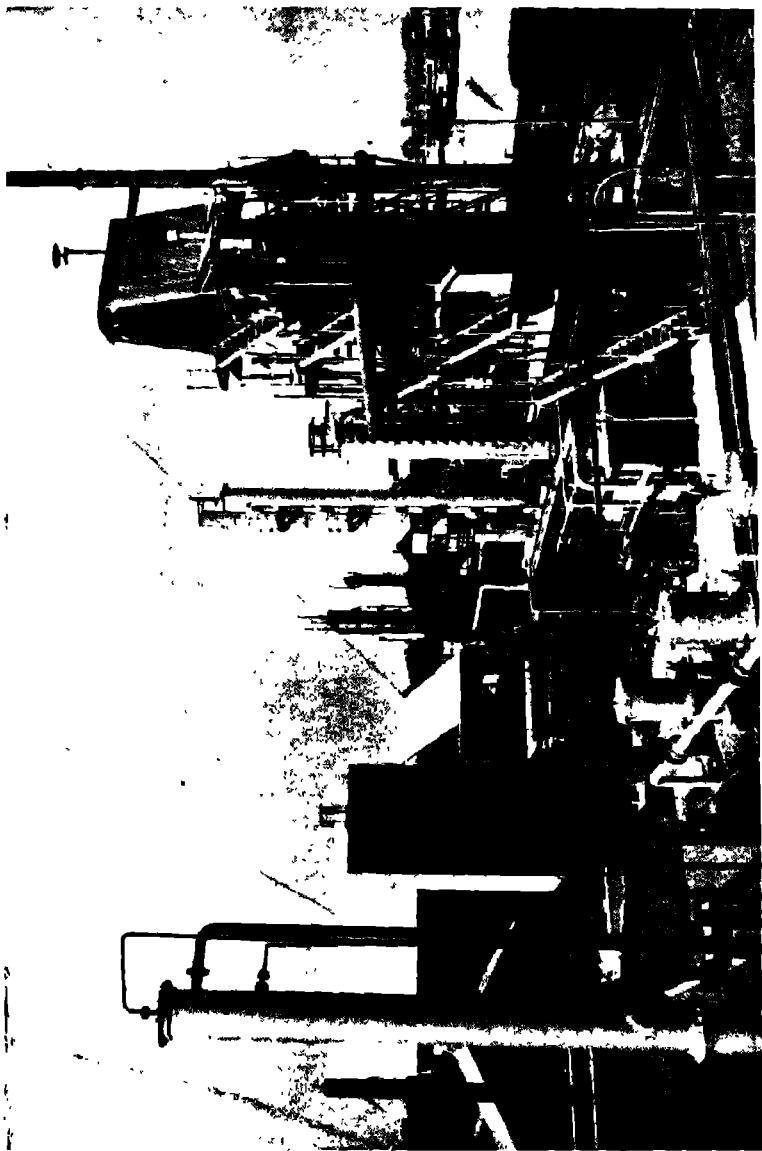
A view of Vanthorn Dam.



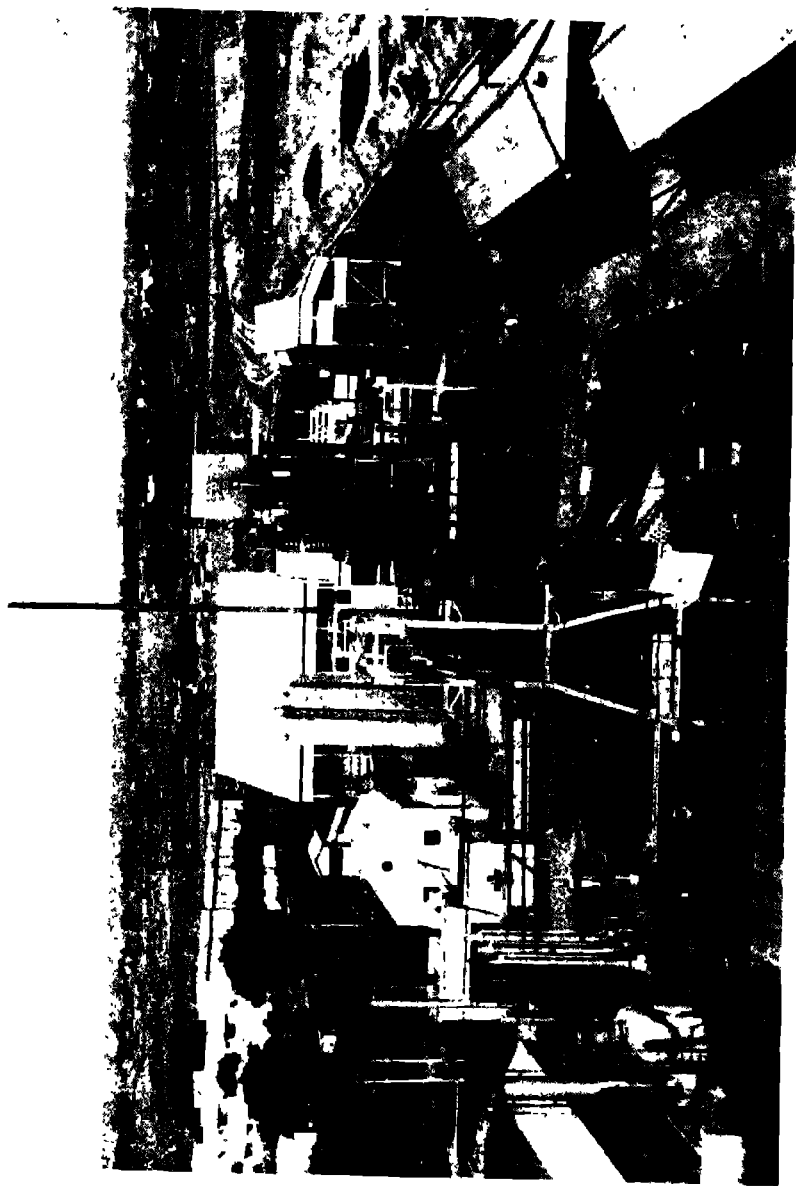
Maithon Dam (downstream face).



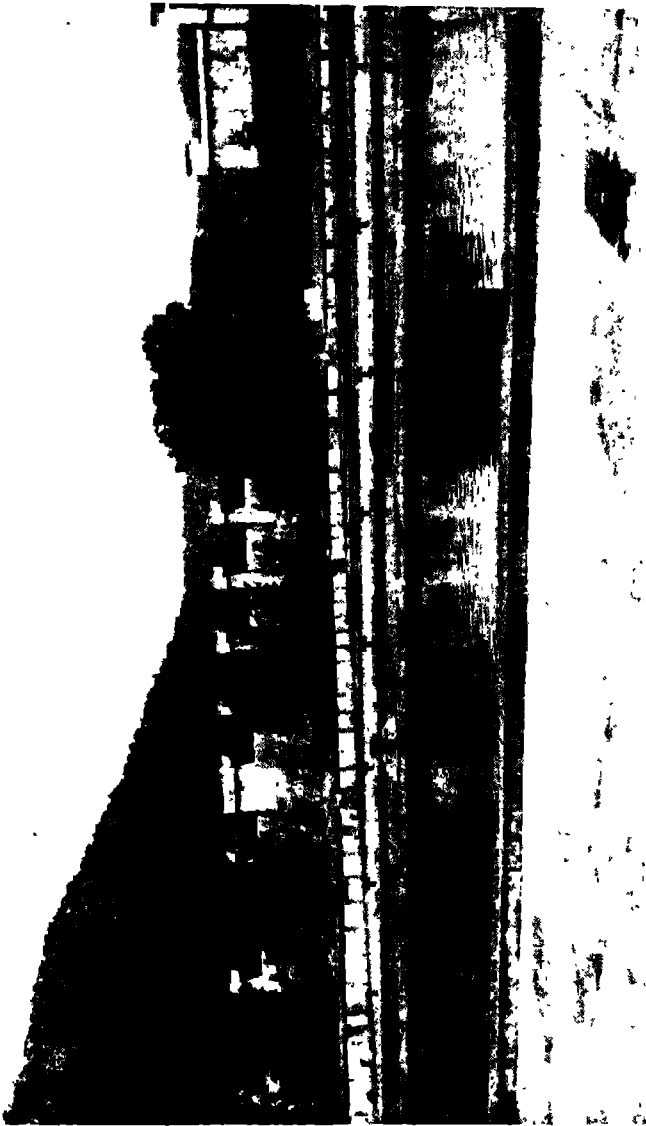
Indian Mines Research Institute, Dhanbad



Prototype Low Temperature Carbonization Plant at Central Fuel Research Institute, Digwadih near Dhanbad.



Some of the Pilot Plants at the Central Fuel Research Institute, Digwadih near Dhanbad.



A view of Topchanchi lake.



A coal cutter

Dr ZAKIR HUSAIN LIBRARY



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